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Yachting

ANNUAL SURVEY NUMBER

WHY NOT TRY THE WEST INDIES? ☆ SMALL BOATS IN WORLD WAR II
THE POST WAR YACHT ☆ PLASTICS FOR BOAT USE
THE BUILDING OF A FLEET ☆ YACHTS AS AN INVESTMENT

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All men and women at the three Chris-Craft factories are working under the Army-Navy "E" with two stars for Excellence in War Production

Keep your spirits high—speed Victory

ARMY E NAVY
Algonac, Mich.

Buy U. S. War Bonds Today—
Tomorrow command your own
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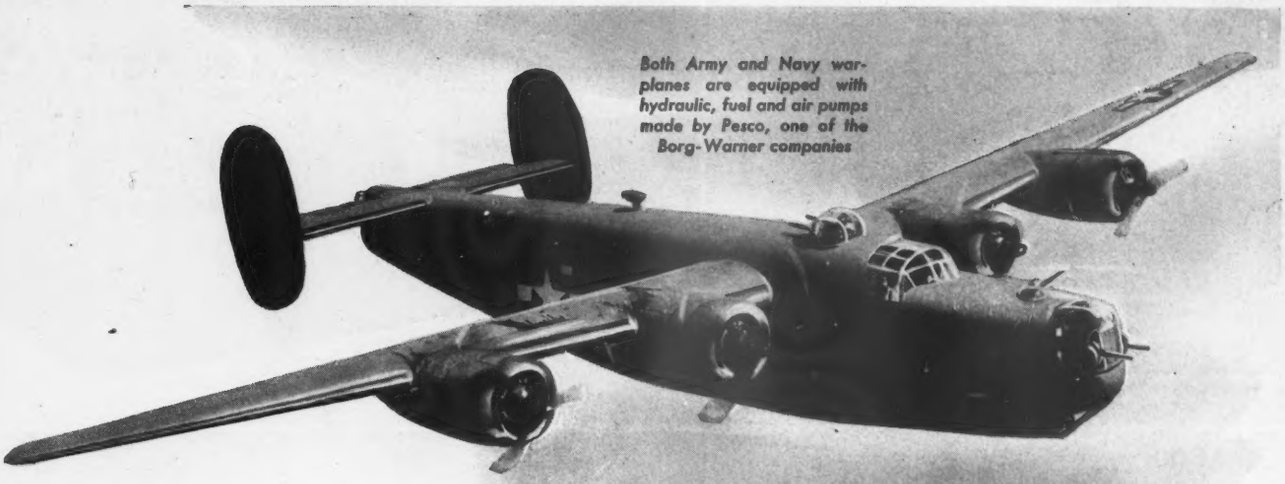
CHRIS-CRAFT CORPORATION, ALGONAC, MICH. ★ WORLD'S LARGEST BUILDERS OF MOTOR BOATS

YACHTING, January, 1944. Vol. 75, No. 1. Published monthly at 10 Ferry Street, Concord, N. H. Editorial, Circulation and Advertising Offices, 205 East 42nd Street, New York 17, N. Y. $4.00 a year, 50 cents a copy. Entered as Second-Class matter at the Post Office at Concord, N. H., under the Act of March 3, 1879.

Tech



Both Army and Navy warplanes are equipped with hydraulic, fuel and air pumps made by Pesco, one of the Borg-Warner companies

Curing "Charlie Horse" in warplanes . . . with a dose of Yankee ingenuity!

"Altitude 10,000 . . . target 1 minute, 49 seconds on course!" It's the pilot calling his bombardier.

Then the order: "Open bomb bay doors!" Smoothly, effortlessly, the great belly flaps swing wide. And it's "Bombs away!" Another mission is completed—successfully.

Today, plane "muscles" which activate bomb bay doors, wing flaps, tail assemblies, landing gears and gun turrets are kept flexible by hydraulic pumps. Of special construction, these oil-filled pumps are pressure loaded for the utmost efficiency. They must not fail, even in the cold thin air "upstairs."

Such equipment is one more proof that our fighters get the finest.

* * *

To the making of these precision aircraft pumps and more than 100 other war items, Borg-Warner brings a guiding principle: "design it better—make it better."

This is the principle which has always animated the sturdy partnership between Borg-Warner and the marine industry. It is one reason why a great share of marine products use one or more Borg-Warner parts.

Today, like you in the marine industry, Borg-Warner is devoting its skills and experience to production for war. But we eagerly look forward to the time when the proved partnership in which we both share will again concentrate its activities on the needs of peace.

When the victory is won, the stress of war will have broadened even further the scope of our mutual abilities . . . and our capacity to cooperate.

BORG-WARNER

Partners with the Marine industry in peace and war, Borg-Warner supplies these and other essential parts . . .

BILGE PUMPS • CARBURETORS • CHAIN AND GEAR TRANSFER DRIVES • FUEL PUMPS • CHAIN HOISTS • MARINE COUPLINGS • REDUCTION AND REVERSE GEARS • MARINE SUPERCHARGERS • STAINLESS STEEL • TIMING CHAINS

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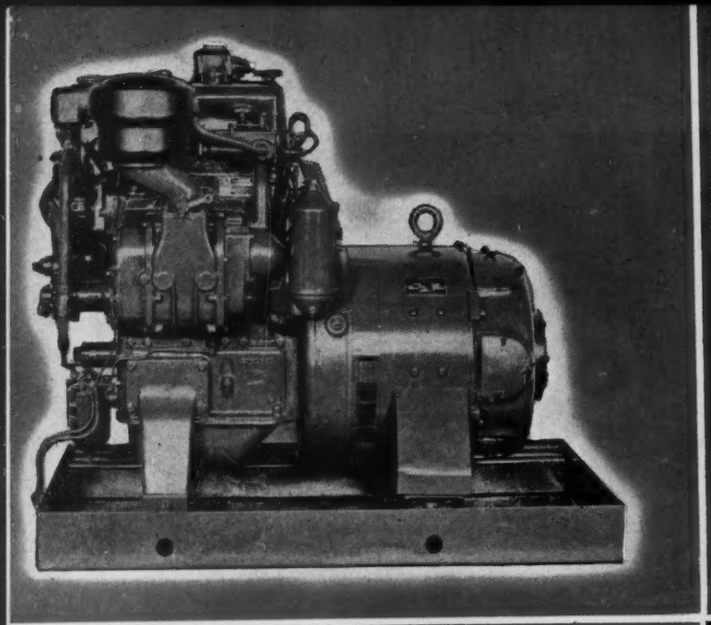
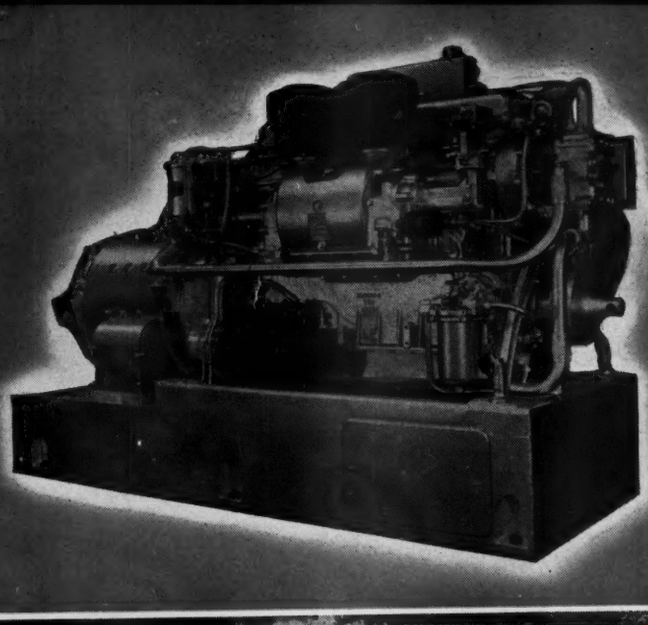
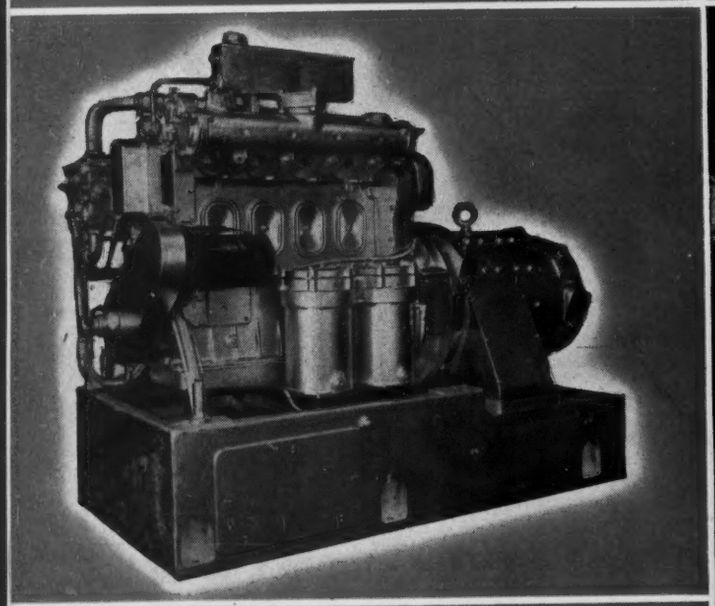
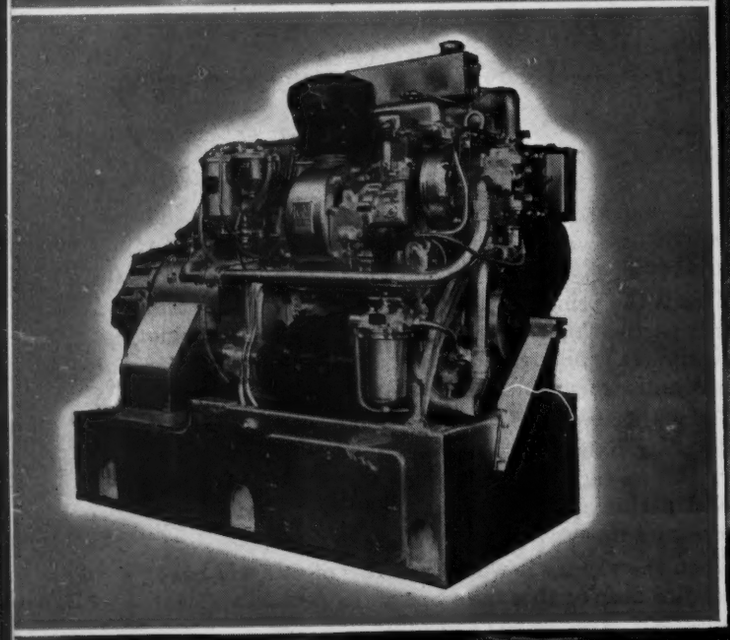
Peacetime makers of essential operating parts for the automotive, aviation, marine and farm implement industries, and of Norge home appliances . . . these companies which form the Borg-Warner Corporation are today devoted exclusively to the needs of war: BORG & BECK • BORG-WARNER INTERNATIONAL • BORG-WARNER SERVICE PARTS • CALUMET STEEL • DETROIT GEAR AIRCRAFT PARTS • INGERSOLL STEEL & DISC • LONG • MARBON • MARVEL-SCHEBLER CARBURETER • MCCULLOCH ENGINEERING • MECHANICS UNIVERSAL JOINT • MORSE CHAIN • NORGE • NORGE MACHINE PRODUCTS • PESCO • ROCKFORD CLUTCH • SPRING DIVISION • WARNER AUTOMOTIVE PARTS • WARNER GEAR



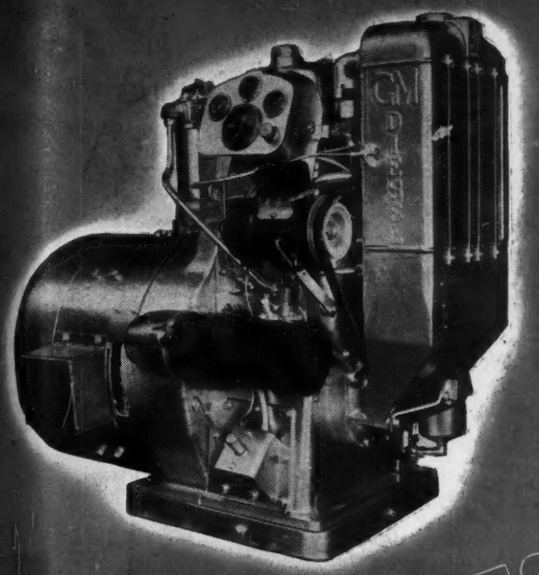






KEEP AMERICA STRONG

BUY MORE WAR BONDS



...AND MUSCLES BY GM

● A MODERN SHIP is a bundle of nerves—nerves that control signaling apparatus, navigation devices, lights, pumps, all kinds of auxiliaries.

These must be supplied with never-failing power.

This is why thousands of vessels sailing the seven seas under GM Diesel power also have GM's tireless, frugal, easy-to-maintain engines supplying power for their auxiliary requirements.

GM
DIESEL POWER

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ENGINES *15 to 250 H. P. DETROIT DIESEL ENGINE DIVISION, Detroit, Mich.*

LOCOMOTIVES *ELECTRO-MOTIVE DIVISION, La Grange, Ill.*

WHAT YACHTSMEN EXPECT IN THE "Cruiser of Tomorrow"... No. 3 of a Series

ARMY E NAVY

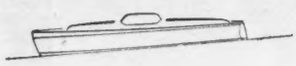
WAR BONDS TODAY
will buy your
"Cruiser of Tomorrow"

THE PRIMARY PURPOSE OF THIS DESIGN IS TO ILLUSTRATE THAT A MOTOR CRUISER CAN BE BEAUTIFUL AS WELL AS PRACTICAL AND SEAWORTHY. THIS IS A DESIGN THAT EMPLOYS STREAMLINING IN ITS SIMPLER AND MORE PLEASANT FORMS. IT IS STREAMLINING WITHOUT THE LOOKS OF AN AUTOMOBILE OR THE LINES OF THE "20TH CENTURY LIMITED". IT IS AN ENDEAVER TO GIVE CLEAN, GRACEFUL BEAUTY TO THE "CRUISER OF TOMORROW".

DEVELOPMENT OF THE LINES —

THE APPARENT HEIGHT OF THE HULL IS REDUCED BY AN EMPHASIZED SHEER PLANK THAT RUNS UNBROKENLY FROM STEM TO STERN.

THE SIDE OF THE TRUNK CABIN SWEEPS BACK THROUGH THE COCKPIT COMBING.



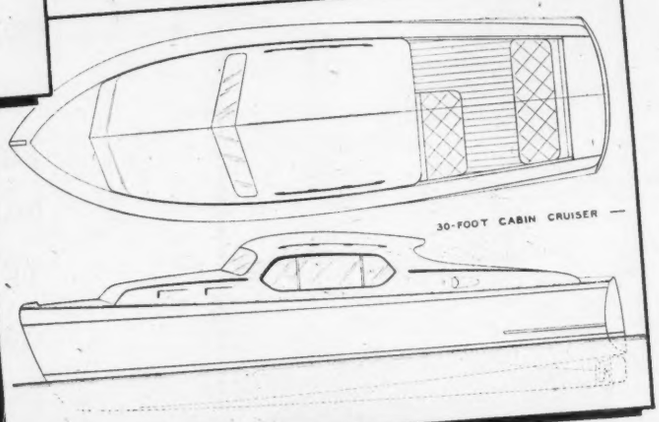
TO THIS IS ADDED A SPACIOUS CABIN WINDOW AMIDSHIPS.

AND THE CRUISER IS THEN COMPLETED.

IF DESIRED, THE DESIGN CAN BE FURTHER ENHANCED BY STREAMLINING THE STERN.

THIS BOAT SHOULD APPEAL TO THOSE WHO LIKE THEM OPEN, AND THOSE WHO LIKE THEM CLOSED — FOR THIS IS THE COMPROMISE! A LARGE AFTER DECK IS THERE FOR FAIR WEATHER AND A SNUG BUT ROOMY MAIN CABIN FOR BAD.

ENTRY OF
CHARLES L. MORSE, JR.
58 CARRINGTON AVE., MILFORD, CONN.
Winner of the $100 War Bond 3rd Prize
in Richardson's
"Cruiser of Tomorrow" Contest



30-FOOT CABIN CRUISER —

A Famous Pre-war Richardson Cruiser

Richardson-built, to Sparkman and Stephens design, this brilliant 31-footer took the yachting world by storm. Sleeps two in the forward cabin, two in the spacious deck-house. Powered with a 6-91 Gray with "V" drive reduction gear.

WRITE FOR YOUR FREE COPY
Entries, facts, figures and trends from the "Cruiser of Tomorrow" Contest, now being compiled. Your copy will be mailed when ready.

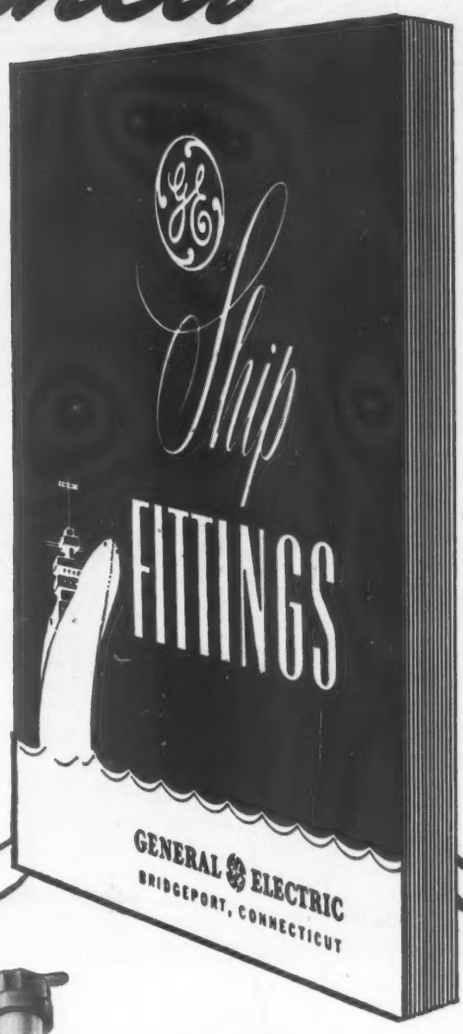
RICHARDSON BOAT CO., INC.
372 SWEENEY ST., N. TONAWANDA, N. Y.

RICHARDSON
CRUISERS *for Peace time*
FIGHTING CRAFT *for War*

Just Launched

A NEW CATALOG

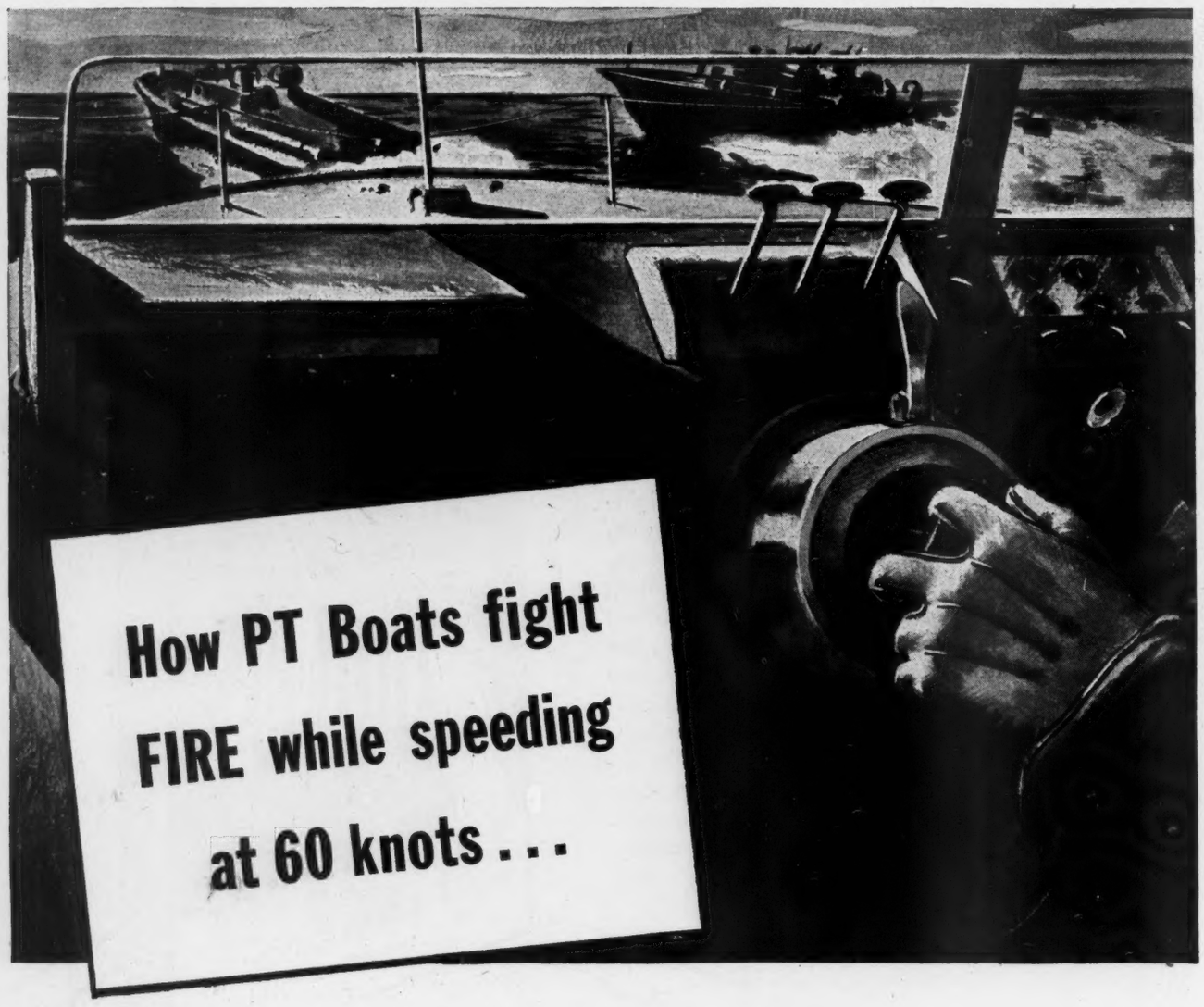
...full of the latest information on distribution boxes, supply and control panels, lighting fixtures, running, signal and flood lights, receptacles, outlets, plugs, couplings, switches, jack boxes, indicators, contact makers, pushbuttons, terminal and stuffing tubes, all manufactured according to the specifications of the U. S. Navy, Bureau of Ships. It is packed full of specifications, spare parts lists, official Navy symbols, cable sizes and lamp types. It contains circuit diagrams for boxes and panels, fuse data, receptacle and plug combinations, installation, packing and brazing data on terminal tubes.



Limited to purchasing agents, design and installation engineers, naval architects, inspectors and other personnel connected with shipyards and industrial organizations. Ask the G-E Merchandise Distributor located near you or write Section SF-141-127, Appliance and Merchandise Dept., General Electric Company, Bridgeport, Conn.

A COMPLETE LINE FOR THE NATION'S SHIPS

GENERAL ELECTRIC



How PT Boats fight FIRE while speeding at 60 knots . . .

EVERYTHING'S geared to speed aboard the swift terriers of the fleet. When fire breaks out, for instance, an operator's hand flashes to a control handle and snuffs out the blaze in a matter of seconds. The Kidde Extinguishing System has smothered it under a blanket of carbon dioxide snow-and-gas.

Until they've swept the seas clear of raiders, the auxiliary fleets of the Army and Navy will need all the new installations that Kidde can turn out. Meanwhile, Kidde representatives and boat builders can help private boat owners to get the most out of their present equipment.

Kidde portable and built-in systems were formerly known by the trade name "LUX".

WALTER KIDDE & COMPANY, INC., 152 MAIN STREET, BELLEVILLE, N. J.

GREATEST MOTORBOAT SHOW in History

NATION'S LEADING BOAT AND ENGINE BUILDERS ROLL OF HONOR 100% ON WAR WORK

The Anchorage, Inc.
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Consolidated Shipbuilding Corp.
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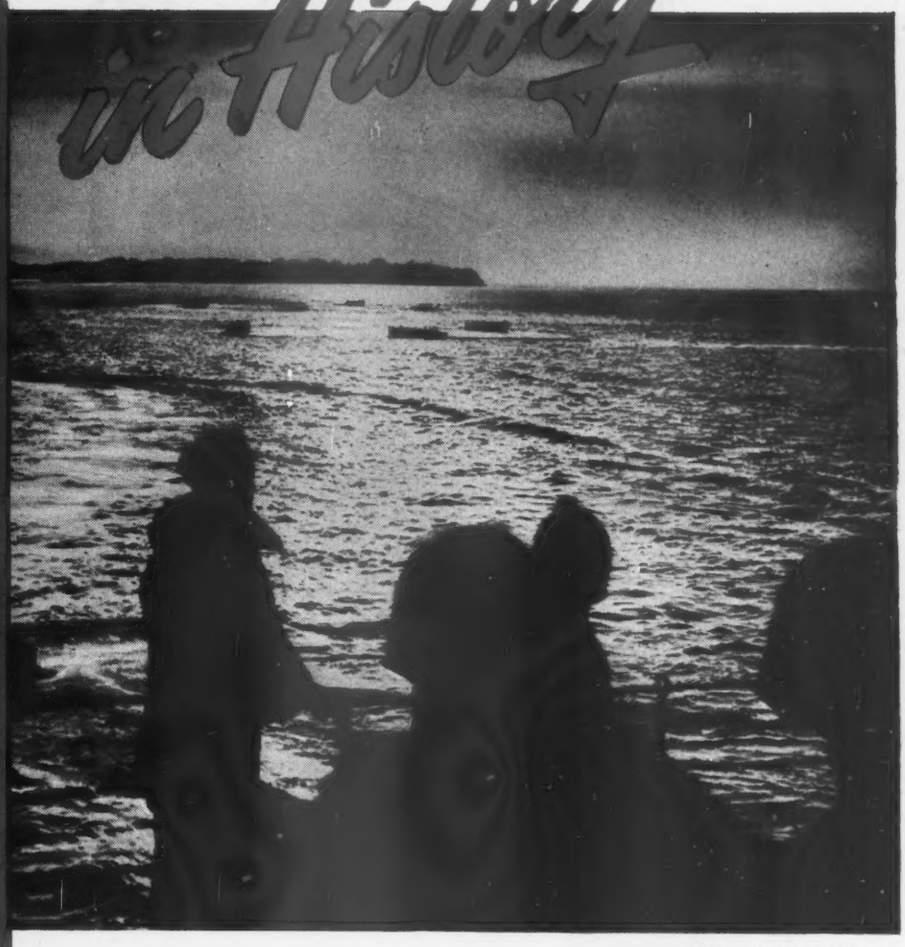


Official U.S. Navy Photo

NO flag-festooned walls of Grand Central Palace or Navy Pier. No exhibits. No milling crowds. Nevertheless, the Industry is this year putting on the greatest show of all . . . doing it in the thick of the fighting throughout the world.

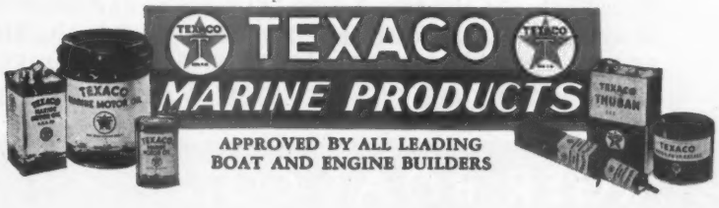
Boat and engine builders have snapped to attention, gone on 24-hour schedules and outfitted Army, Navy, and Coast Guard with the greatest armada of small craft ever to come into existence.

Texaco has been equally busy, manufacturing and supplying lubricants and fuels to this Industry . . . for break-in and trial runs, as well as to all other types of industry and to the Armed Forces . . . for use in all parts of the world.

Texaco is proud of its very close association with the Boating Industry, and happy to pay this tribute to a big job being very well done.

The Texas Company, *Marine Sales Division,* 135 East 42nd Street, New York 17, N. Y.

TUNE IN FRED ALLEN EVERY SUNDAY NIGHT—CBS

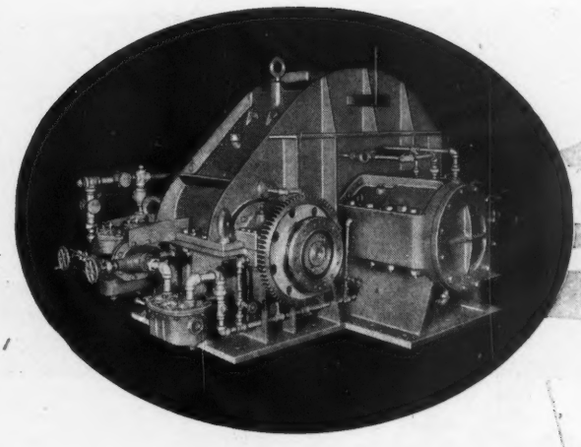


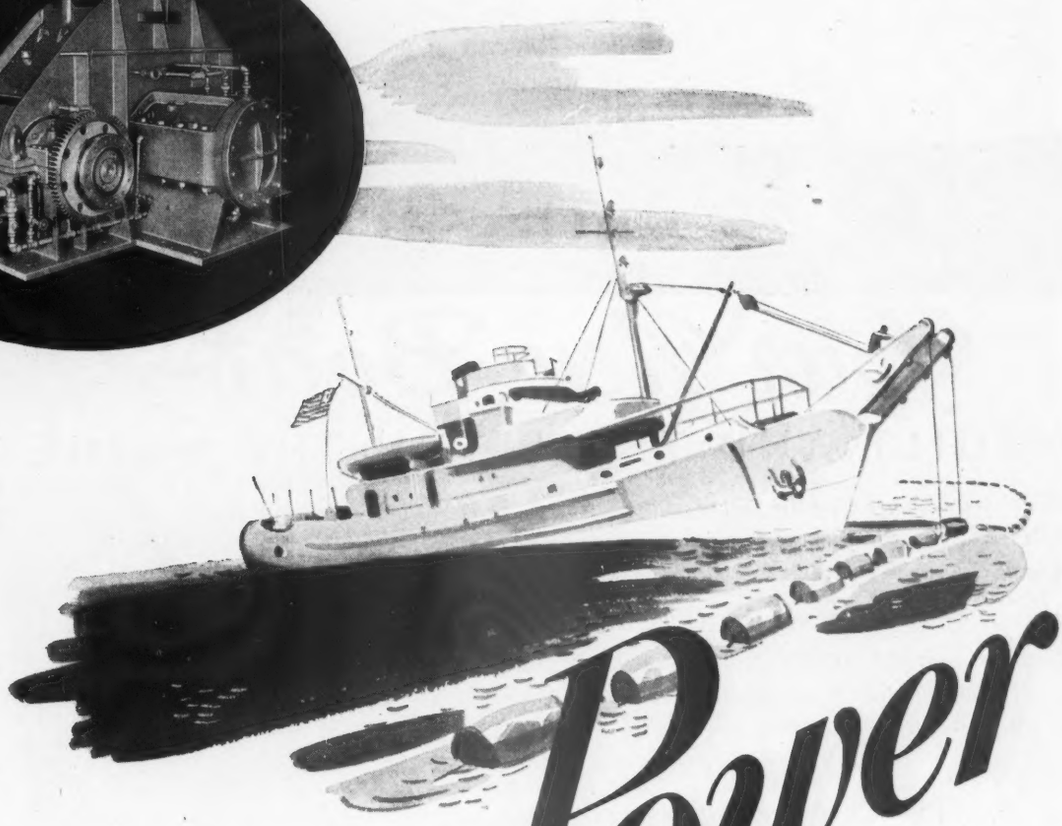
THE FIRST OF A NEW TYPE

TO BE PRODUCED AND DELIVERED

FIFTY YEARS OF CONTINUOUS SHIPBUILDING, INGENUITY, COURAGE, BUSINESS ACUMEN, CONSTRUCTIVE PLANNING AND EFFICIENT CRAFTSMANSHIP, CONTRIBUTED TO THE ACCOMPLISHMENT OF THIS FEAT. . . . PEACE TIME APPLICATION OF THESE FEATURES WILL GIVE YOU AN EVEN FINER WOOD OR WELDED STEEL YACHT. . . . BUY MORE WAR BONDS . . .

BURGER BOAT CO. ★ MANITOWOC ★ WIS.





PROTECTIVE *Power*

TO MAINTAIN THE FENCES THAT KEEP OUT UNDERWATER WOLVES

Uncle Sam's net tenders have a vital job to do. Accumulation of barnacles and seaweed on nets demands constant attention and vigilance. Net tenders must mend and maintain intact, at all times, the underwater "fences" that protect important harbors and sea lanes from marauding U-boats.

The job imposed on propulsion equipment is a tough one. Propulsion power is in almost continuous use to keep the tender in position while raising or lowering nets.

Westinghouse Marine Gear Units are helping to meet the exacting requirements of this vital role with the same high performance standards long established in peacetime applications. Precision-manufactured under the supervision of marine engineers who for 36 years have worked directly with shipbuilders and designers, these marine gear units are contributing an important share in today's all-important anti-U-boat efforts. Westinghouse Electric & Mfg. Co., East Pittsburgh, Pa., Dept. 7-N.

J-07206

Westinghouse *Marine Gears*

PLANTS IN 25 CITIES ... OFFICES EVERYWHERE

Your New Boat~

—BUILT AND TESTED ON THE MAINE COAST!

Hinckley-built boats offer the finest features of custom built craft — the result of years of experience in the construction of some of America's outstanding sail and power yachts* . . .

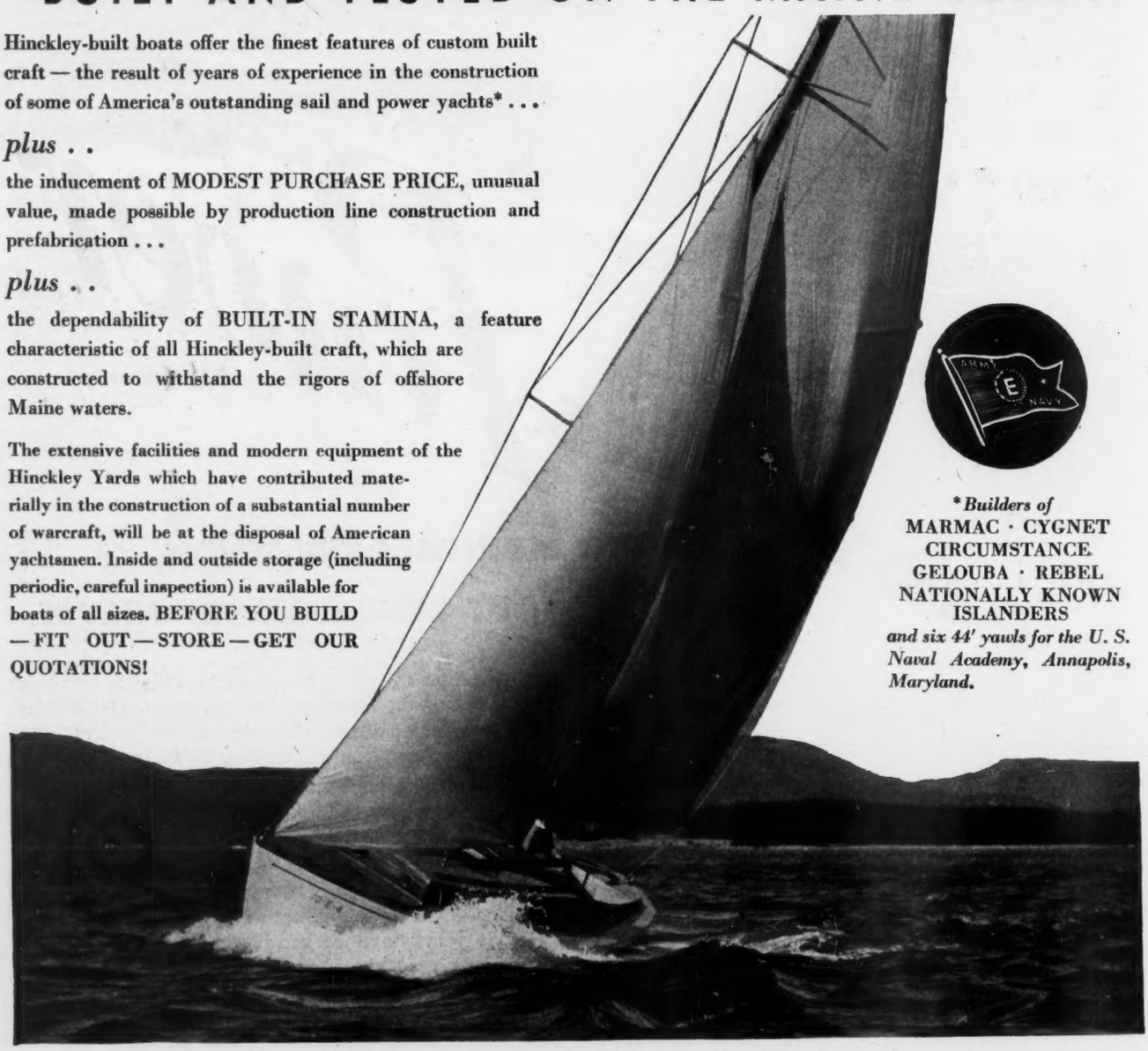
plus . .

the inducement of MODEST PURCHASE PRICE, unusual value, made possible by production line construction and prefabrication . . .

plus . .

the dependability of BUILT-IN STAMINA, a feature characteristic of all Hinckley-built craft, which are constructed to withstand the rigors of offshore Maine waters.

The extensive facilities and modern equipment of the Hinckley Yards which have contributed materially in the construction of a substantial number of warcraft, will be at the disposal of American yachtsmen. Inside and outside storage (including periodic, careful inspection) is available for boats of all sizes. BEFORE YOU BUILD — FIT OUT — STORE — GET OUR QUOTATIONS!



**Builders of*
MARMAC · CYGNET
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NATIONALLY KNOWN
ISLANDERS
and six 44′ yawls for the U. S. Naval Academy, Annapolis, Maryland.

HENRY R. HINCKLEY & COMPANY

SOUTHWEST HARBOR, MAINE

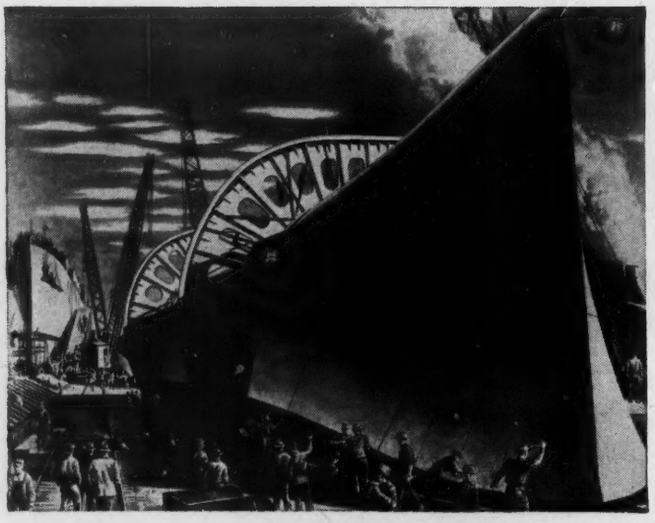
Built to set the pace

and HOLD IT!

After more than a decade of service in all types of pleasure craft, work boats and fishing vessels on the kind of jobs that really put power "through the wringer" —this fact about Cummins Dependable Diesels stands out like an unbroken window in Berlin: They are built to set the pace in dependability, economy and speed—and hold it! Day and night...until the job is wrapped up and delivered.

CUMMINS ENGINE COMPANY

Columbus, Indiana

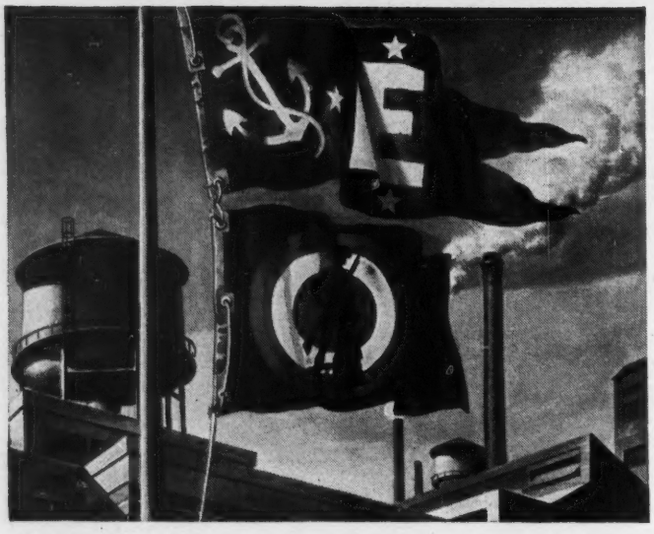


On Land!

Defoe is now building 1700-ton Navy Destroyer-Escort ships—the *largest* warships ever launched on the Great Lakes. Through its unique "roll-over" process, Defoe is able to deliver *twice the production per man hour,* resulting in double the number of ships built at *half the labor cost per vessel!* And all without a dollar of government financing.

On Sea!

With depth bombs, shell fire and ripping knife-like prows, hard-hitting DE ships, such as Defoe builds, are smashing U-boat packs and clearing the sea lanes for America's convoys. By releasing more and more destroyers for other combat duty, these battleworthy craft have added tremendously to the striking power of our Navy.



In The Air!

The Navy "E" with three White Star Renewal Citations flies from the Defoe flagstaff . . . along with the Treasury Department's special Bull's-eye flag awarded because Defoe employees regularly take more than 10% of their pay in War Bonds. And when Peace returns, the experience and ingenuity of this organization will play an important part in building new and better products for America.

DEFOE SHIPBUILDING COMPANY, BAY CITY, MICHIGAN

Three White Star Renewal Citations now decorate the Navy "E" Award won by Defoe workers.

Defoe

Ships for Victory
Servants for Peace

"Work and Play" by Gordon Grant

No...we can't build a breeze!

Like a tree, a breeze is the exclusive handiwork of Heaven.

But there are many interesting things we can build for you, comes peace. Products that will possess much of what we have learned from our work for war . . . which is marine welding.

This war has pushed welding science ahead 10 years in two. More and more products are being welded—and will be welded—*for greater strength, metal-saving, lighter weight, faster production.*

Tomorrow our name, CHURCHWARD, may be on some interesting new products you will want to use.

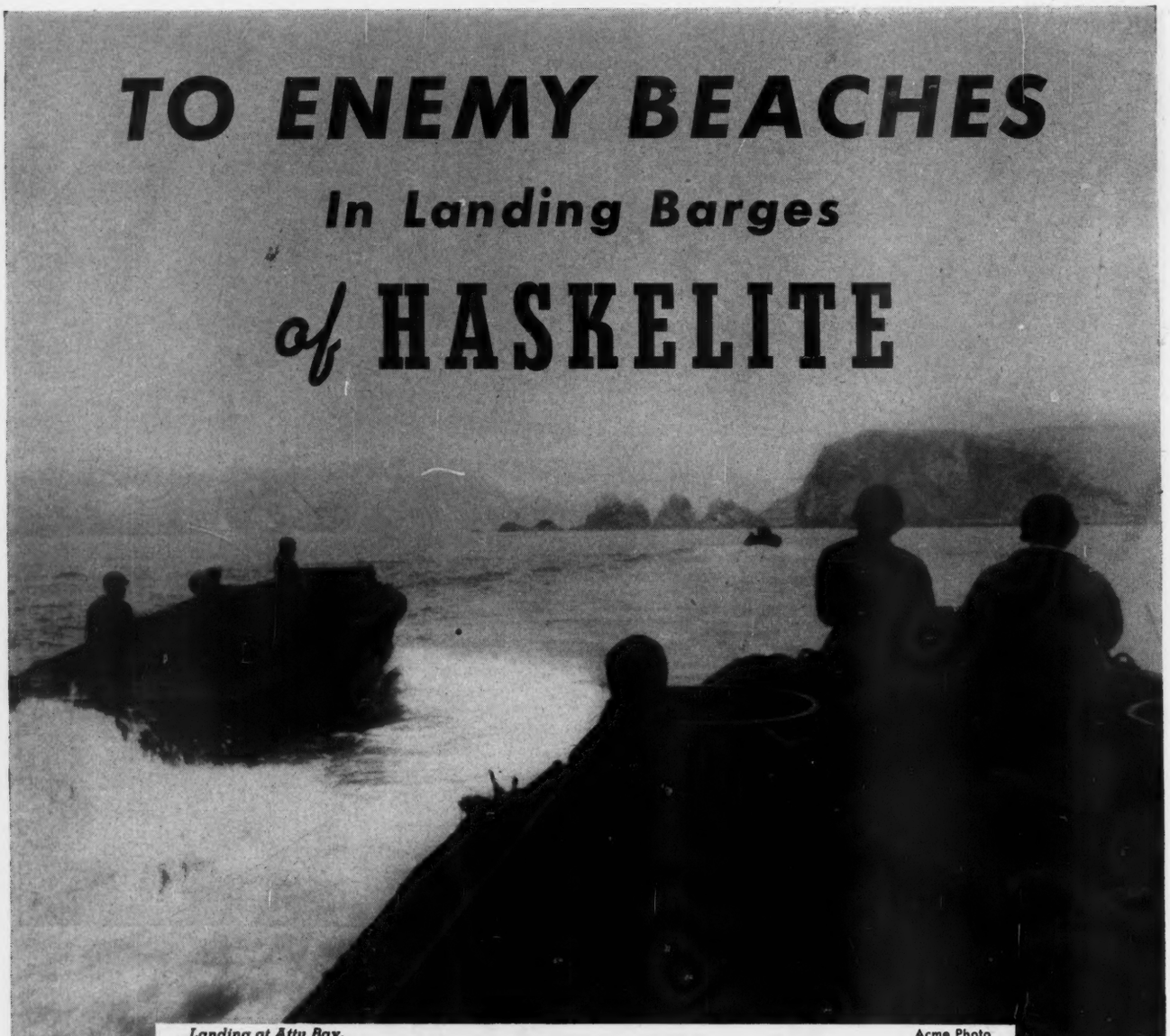
The time for you to think about these things is *now—TODAY.*

CHURCHWARD & CO. • 37 WATER STREET • WEST HAVEN, CONN.

TO ENEMY BEACHES

In Landing Barges

of HASKELITE



Landing at Attu Bay. Acme Photo

● This is a war of "beach heads." Victorious action in each new phase has been preceded by landings from barges many of them constructed of Haskelite Marine Plywood. Further developments promise even more landing operations—and more difficult ones.

Asking no quarter from sea or enemy, and giving none... these tough landing boats are made to take the severest punishment, even though lighter in weight than boats made with older, less easily fabricated materials. This very lightness adds to their maneuverability without any sacrifice in strength or safety.

After the war, new "landings" on the field of new products will be made with Haskelite materials.

HASKELITE MANUFACTURING CORPORATION
GRAND RAPIDS 2, MICHIGAN
CHICAGO, ILLINOIS • DETROIT, MICHIGAN • NEW YORK CITY

*T. M. Reg. U. S. Pat. Off.

HASKELITE

MARINE PLYWOOD • PLYMOLD*

THE TREASURE OF A CENTURY

ARMY E NAVY

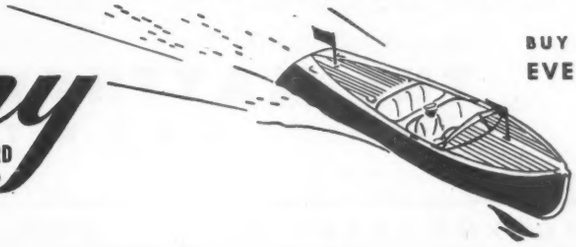
For years, Century boats have been built of the very materials that are today listed among the world's most valuable. They are valuable not because they are as scarce as gold, but because they do certain jobs better than any other materials known to man.

In war, where all adverse conditions must be met, men can not risk failure. The sinews of war are fashioned from the *best* the world has to offer. The resulting "critical" lists include, almost without exception, all the priceless materials used in the construction of Century boats.

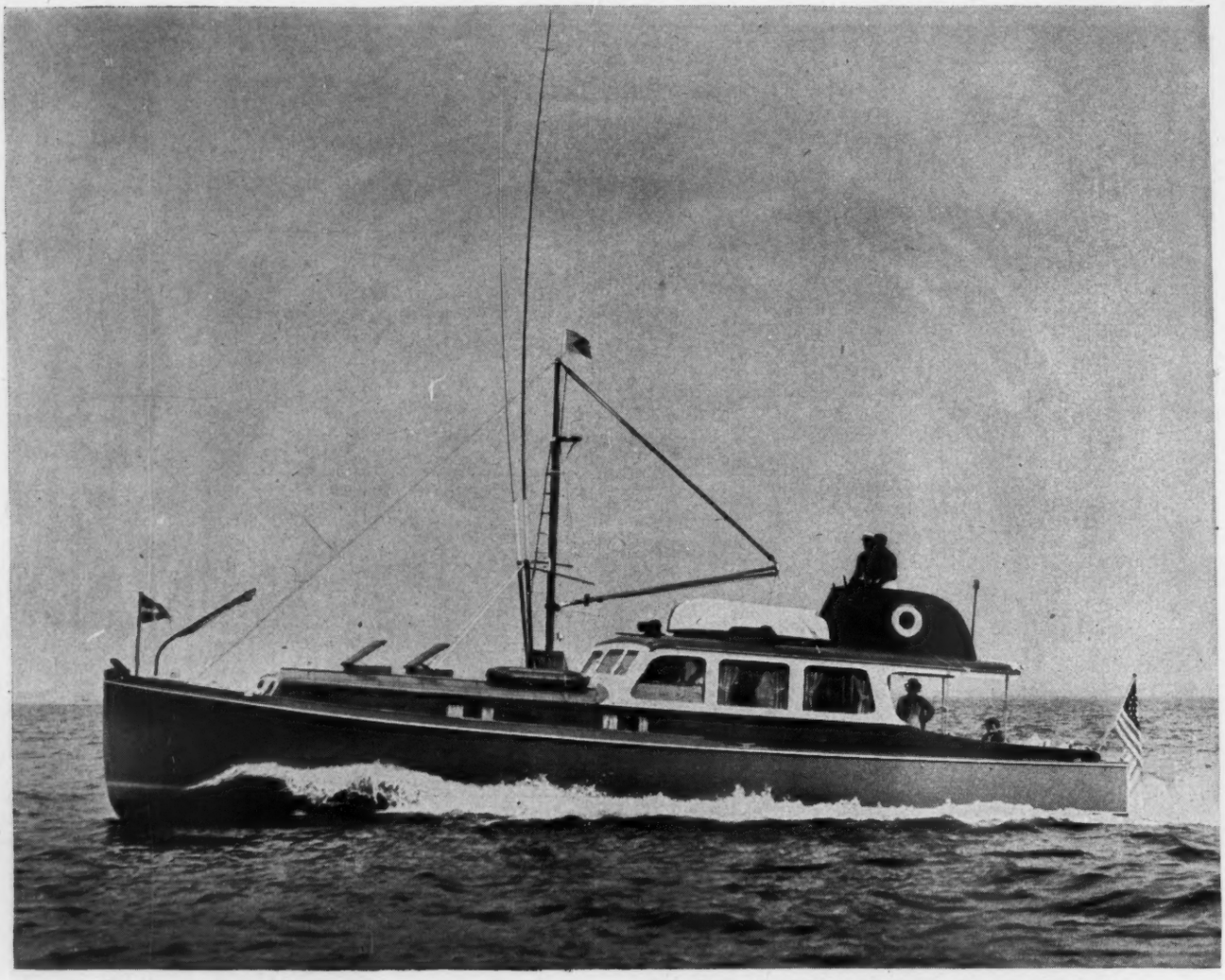
We have always made a point of choosing only the best material for Centurys. There is real meaning to that point. Think of it when pleasure boats are again available—and you are ready to buy.

CENTURY BOAT CO., Box 301, Manistee, Mich.

Century
BUILDER OF FINE INBOARD & OUTBOARD
BOATS



BUY WAR BONDS
EVERY PAY DAY



Matthews "50" Sport Sedan with complete fishing gear. Powered with a pair of 180 HP. Sterlings.

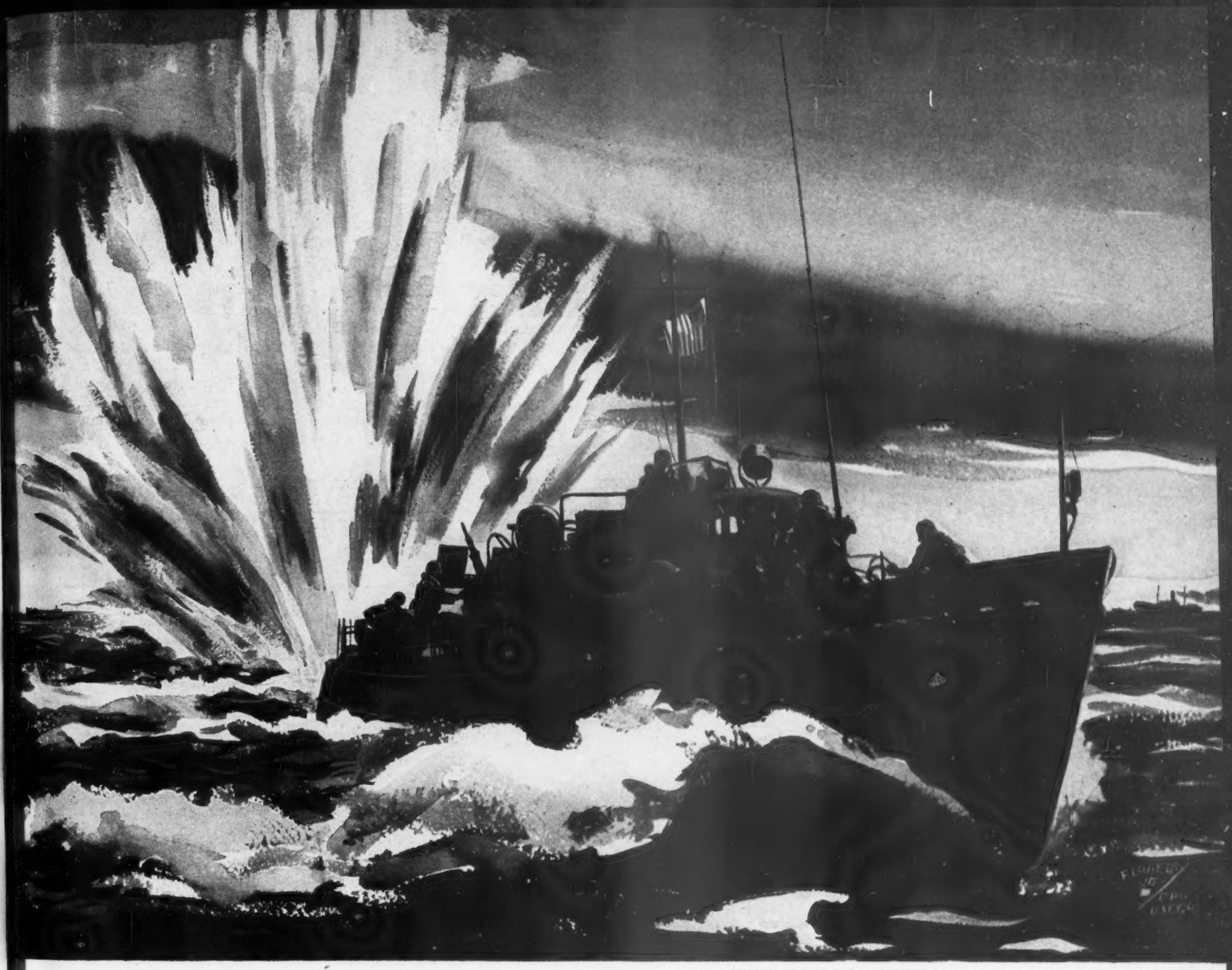
There's a Great Day Coming . . .

when peaceful pursuits can again be the order of the day . . . when the whole boating industry can again meet you and you and you at the annual New York Motor Boat Show . . . when the new models will grace the floor on display and you'll be champing at the bit for spring to come to launch your new Matthews.

Let's hasten that Great Day by buying our limit of War Bonds this month!

THE MATTHEWS COMPANY
PORT CLINTON • OHIO

"Wherever you cruise . . . you'll find a Matthews"



SEA-GOING WATER COLOR BY JOHN J. FLOHERTY, JR., CPO, U.S.C.G.R.

FULL FORWARD TO FULL ASTERN...

in 3/5 of a Second

Let go one . . . Let go two . . . and the speedy craft darts around weaving a pattern of T.N.T. that spells doom for another enemy under-sea raider.

These 83′ patrol boats, among the fastest in Coast Guard Service, are daily making history in the sea lanes of the world. Powerful engines, controlled by reverse gear and throttle controls that will shift them from *full forward to full astern* in a *fraction of a second,* give them the speed and maneuverability necessary for sub warfare.

Think of it! Here is a foolproof finger-tip control that gives the skipper *complete* command of his vessel. He can turn her on a dime . . . Let go his depth charges and pull away to a firing position, ready for action when and if the sub surfaces.

The performance of Panish Controls under actual combat conditions is an amazing story of split-second maneuverability. It has been proven time and again that Panish builds the finest reverse gear and throttle control made.

PANISH CONTROLS

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A LIMITED NUMBER OF REPRINTS OF THE ABOVE PAINTING, SUITABLE FOR FRAMING, ARE AVAILABLE ON REQUEST

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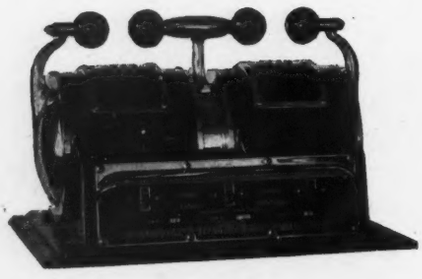
PANISH CONTROLS THE ENGINES ON THE 83' COAST GUARD CUTTERS . . .

The Last Word in Remote Controls

The U. S. Coast Guard, U. S. Army-Transportation Corps and Air Corps selected "Panish Controls" for sub chasers and aircraft rescue vessels because the Panish Control system accomplishes "split second" maneuvering with definitely foolproof operation. The maneuverability of these big vessels is spectacular. The pilot can operate two, three or more engines instantaneously in any direction entirely by feel, using but one hand. His maneuvers are executed with speed, precision and complete elimination of the human element.

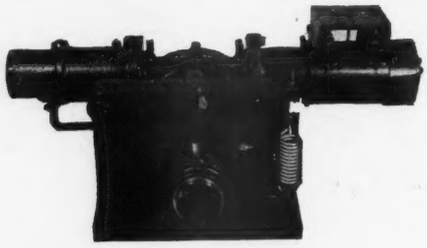
PANISH CONTROL STATION

FOR TRIPLE ENGINES



1. Single lever controls both Reverse Gear and Throttle.
2. Twin levers for twin engines arranged for one hand operation.
3. Finger-tip control at any speed.
4. Either mechanical or hydraulic throttle operation with either single or multi-point control.
5. Mechanical or hydraulic operation of throttle, optional at any time.
6. One single type of remote Control Station for both mechanical and hydraulic throttle operation and single or multi-point control.
7. Controls levers mechanically locked and electrically interlocked with reverse gear operating unit.
8. Throttles cannot be opened unless reverse gear is fully engaged in either direction.
9. Operation of reverse gear is indicated at remote Control Station in three ways — *It can be seen; it can be heard;* and *it can be felt.*
10. Construction all bronze and extremely rugged.
11. Immune to rough handling and definitely foolproof.
12. Low-battery warning signal provided at remote station.
13. Automatic elimination of magnetic compass interference.
14. Splash and rain proof. Immune to temperature variations.
15. All interior parts accessible through large hand hole cover.
16. Arranged for horizontal mounting near steering position.
17. Large, ten screw mounting flange for watertight installation.

PANISH REVERSE GEAR OPERATING UNIT



A New Method . . . A New Control . . . A New Result

1. Small and compact, powerful and noiseless in operation.
2. Permanent, flange type mounting on side of reverse gear housing.
3. Reversible for right or left hand installation.
4. Unit does not obstruct inspection and adjustment openings of reverse gear.
5. Power Unit coupled permanently to reverse gear operating shaft.
6. Automatic mechanical overload protection for reverse gear and power unit.
7. Controlled torque output adjustable and permanently maintained.
8. Instantaneous and automatic release of thrust load without backing off, after reverse gear has been engaged in AHEAD or ASTERN.
9. Reverse gear positively held in engaged position while thrust load is removed.
10. Reverse gear is fully engaged irrespective of variations in angle of movement required on operating shaft.
11. Power unit automatically compensates for any change of operating angles in either direction.
12. No adjustments of any sort required for the end positions of AHEAD and ASTERN. NEUTRAL position only adjustable.
13. Eliminates all end position limit switches, overload clutches, solenoid brakes, time fuses, or other current limiting devices.
14. The Reverse Gear is engaged positively without jamming in either direction.
15. Electrically operated from starting battery or any other electrical power supply.
16. Motor cannot be stalled.
17. High mechanical efficiency and low current consumption.
18. Maximum operating time per maneuver is from three-fifths to one second for FULL AHEAD to FULL ASTERN and from one to two-fifths of a second for NEUTRAL to AHEAD or ASTERN.
19. Instantaneous emergency hand operation without the need of uncoupling the power unit or any other preparatory operation.
20. The unit declutches itself automatically when the reverse gear is operated by hand.

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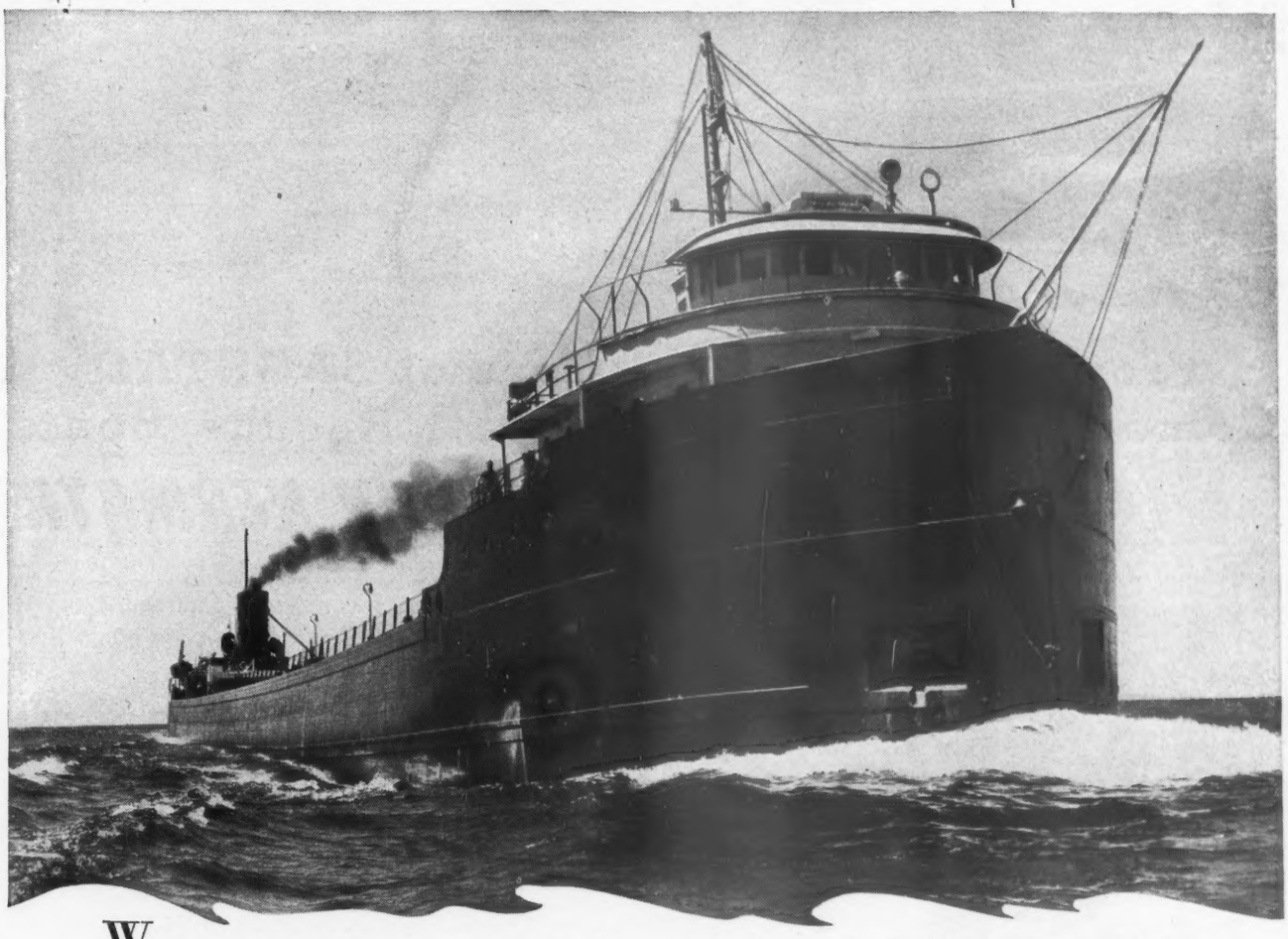
OTHER PANISH PRODUCTS: REMOTE LANDING GEAR CONTROLS FOR AEROPLANES - REMOTE CONTROLS FOR DIRECT REVERSING DIESEL ENGINES - HYDRAULIC THROTTLE ACTUATORS

In War or Peace the Finest Ships Rely on RADIOMARINE



While the Great Lakes are fortunately free from "tin fish" and Focke-Wulfs, they are nonetheless another important battlefront of our Merchant Marine.

For across these enormous inland seas, grain, ore, coal, oil, and other vital war materials must be transported. In spite of ice, storms, and other obstacles, these fleets must maintain their capacity schedules—must depart and arrive on time—so that workers may eat and factories may continue to turn out the materiel of war. Radiomarine equipment on the ships of the Great Lakes Fleet is helping them deliver these precious cargoes on time.

The entire facilities of Radiomarine Corporation of America, including its service stations at 21 ports are totally mobilized for war and are engaged in equipping merchant ships and the ships of our armed forces with complex radio-electronic installations required in fighting a global war . . . When victory is ours, the improved radio-electronic equipment developed for this purpose will be made available for all vessels—from pleasure craft to luxury liners.

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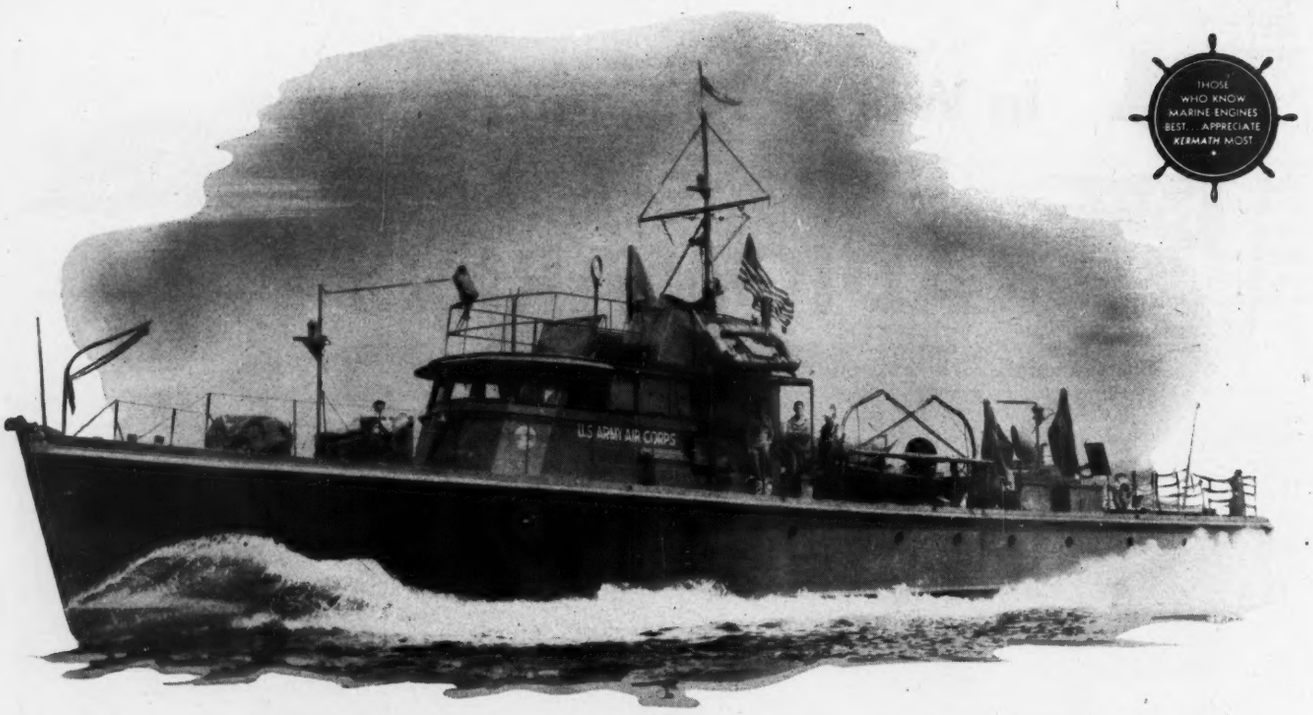

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From the Launching-Ways of SAGSTAD Come More 104 Foot Aircraft Rescue Boats

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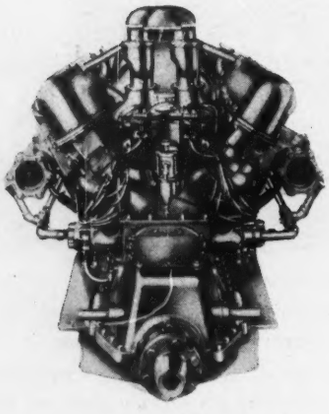

Three Kermath V-12 all-marine 550 H. P. standard Sea-Raider engines power the 104 foot Army Air Corps Rescue Boats illustrated above.

● The U. S. Army Air Corps leaves no stone unturned, no calculations left to chance in serving the ends of Victory and the safety and security of its fliers.

Here is an example of this thorough-going efficiency—represented by the volume production of these big, highly maneuverable, staunchly designed sea going rescue vessels. Sagstad Shipyards of Seattle are adding to the growing fleets of these 104 foot Army Aircraft boats to meet the needs of our expanding Air Arm.

Significantly, many of these boats are powered with Kermath V-12 550 horsepower Sea-Raider, all-marine power plants to meet the critical specifications of speed, reliability and endurance afloat. Here is still another example of Kermath's widespread military contributions to the war effort—another striking example of engineering "know how" put to good use in bringing victory's goal the closer.

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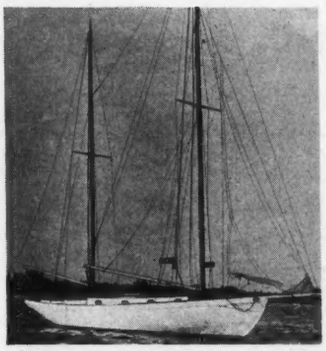
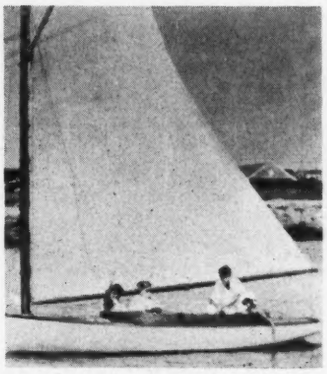


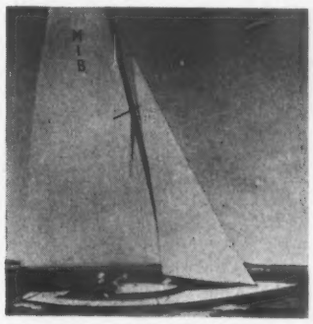
No. 274 — For Sale. Able ketch 37′ overall, 29′ waterline, 10½′ beam, 5′ 10″ draft. Built 1926. New four cylinder motor 1941, in separate compartment. Galley aft. Roomy cabin. Toilet amidships, double staterooms foreward. Well equipped. Laid up Rhode Island.



No. 1830 — For Sale — Handy Crosby Cat at Falmouth, Mass. 18′ x 8′. Inside ballast. In good condition. Bargain $300.

No. 5427 — For Sale — Converted Class M boat 80′ overall, 54′ waterline, 14′ beam, 10′ draft. Outside lead ballast. Mahogany planked. In beautiful shape, 1937 Superior Diesel motor. Racing rig has been cut down but boat is very fast. One double, one single stateroom, two owners toilets. Comfortable cruiser. Laid up near Boston.

No. 309 — For Sale — One of our well known centerboard Schooners. Our design. 33′ waterline, 43′ overall, 12′ 6″ beam, 4′ 3″ draft. New motor 1940. Large double stateroom, sleeps six. Believe in first class shape. Now on Lakes.



No. 4214 — For Sale — M. B. Knockabout Paine designed Lawley built. 29½′ x 17½′ x 6½′ x 4′ 3″ draft. Self bailing cockpit, two transoms in cabin. Fast and able. At Marblehead.

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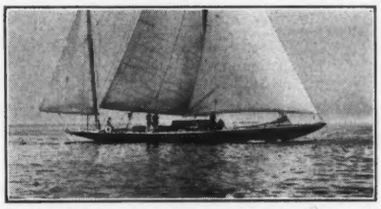
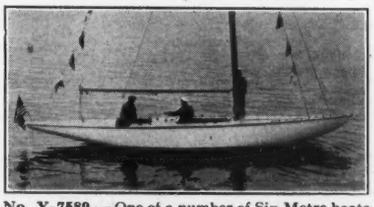
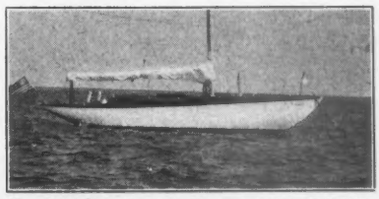


No. Y-8466 — FOR SALE — 54′ waterline auxiliary Diesel yawl, built from designs by Burgess. Four berths in main cabin, double and single stateroom and two lavatories in owner's quarters. For further data consult SPARKMAN & STEPHENS, Inc., 11 East 44th Street, New York.

No. Y-70043 — FOR SALE — Auxiliary cutter 32′ 9″ x 28′ 6″ x 10′ 10″ x 5′, built from designs by Alden. Two berths in main cabin, double stateroom, galley, etc. Husky cruising boat. For further information, price and location consult SPARKMAN & STEPHENS, Inc., 11 East 44th Street, New York.



No. Y-7589 — One of a number of Six-Metre boats that we are offering for sale; several among the best in the Class, others that have been outclassed racing would be desirable to convert to cruising boats for day sailing. For further information consult SPARKMAN & STEPHENS, Inc., 11 East 44th Street, New York.



No. Y-7500 — One of the successful N.Y.Y.C. 32 Footers, built by Nevins from our designs. Two berths in main cabin, double stateroom aft, lavatory, galley and pipe berth forward. For further information consult SPARKMAN & STEPHENS, Inc., 11 East 44th Street, New York.

No. Y-7719 — FOR SALE — Auxiliary sloop 26′ 3″ x 23′ x 8′ 3″ x 4′ 10″, with sleeping accommodations for four. For more complete information, price and location consult SPARKMAN & STEPHENS, Inc., 11 East 44th Street, New York.

No. Y-8494 — FOR SALE — 30′ waterline auxiliary yawl, built by Minneford at City Island from designs by Rhodes in 1937. Large main cabin, double stateroom, lavatory and galley. Class B winner in New London-Gibson Island race in 1937. SPARKMAN & STEPHENS, Inc., 11 East 44th Street, New York.

No. Y-6033 — FOR SALE — Auxiliary schooner 55′ 4″ x 42′ x 14′ 3″ x 7′ 4″, built from designs by Hand. Sleeping accommodations for seven, two lavatories in owner's quarters. Lathrop motor. For further information, price and location consult SPARKMAN & STEPHENS, Inc., 11 East 44th Street, New York.

No. Y-7100 — FOR SALE — Auxiliary sloop 30′ x 23′ x 8′ 4″ x 4′ 9″, built in 1939 from our designs. Sleeping accommodations for three, lavatory, galley, lead keel, mahogany planking. For further data consult SPARKMAN & STEPHENS, Inc., 11 East 44th Street, New York.

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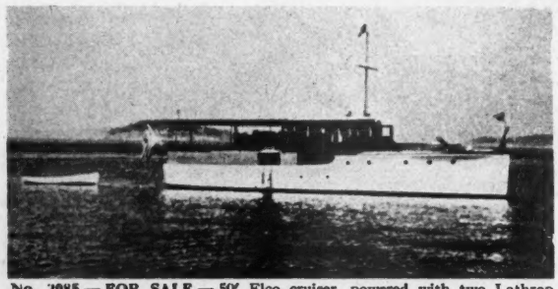
No. 2103 — FOR SALE — Elco designed 53′ twin-screw cruiser, one double and two single staterooms, with bath in owner's quarters. For further details, communicate with YACHT SALES & SERVICE, Inc., 1528 Walnut St., Phila.



No. 2085 — FOR SALE — 50′ Elco cruiser, powered with two Lathrop motors installed new 1941. Splendid owner accommodations, 32-volt generator, electric refrigeration and windlass. For further particulars, communicate with YACHT SALES & SERVICE, Inc., 1528 Walnut St., Phila.

No. 1675 — FOR SALE — 70′ Alden designed gaff rigged schooner, built by Lawley, new Chrysler motor, two double, one single staterooms. A fine seaboat. For further particulars, communicate with YACHT SALES & SERVICE, Inc., 1528 Walnut St., Phila.

No. 1294 — FOR SALE — 44′ twin-screw Chris-Craft cruiser, new 1941, accommodations for six and one crew. Many extras including teak decks. For further particulars, communicate with YACHT SALES & SERVICE, Inc., 1528 Walnut St., Phila.

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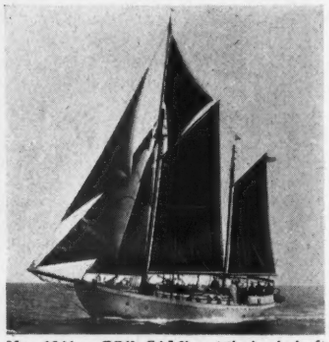
41′ MOTOR SAILER — Built 1938, well designed and beautifully built. A most attractive offering.



No. 1346 — FOR SALE — 60′ shoal draft auxiliary gaff rigged ketch, built to exceptionally fine specifications. Most complete. A roomy comfortable cruiser.

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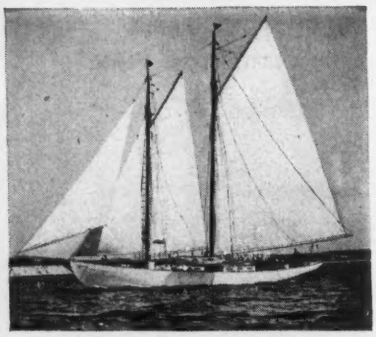
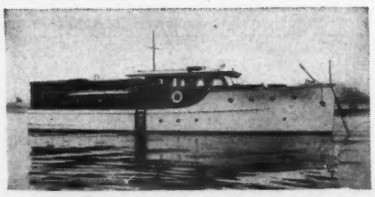
FOR SALE—85′ Diesel Schooner. Inspectable near Boston.



FOR SALE—52′ Auxiliary Schooner. Sleeps six. Heavy construction. Inspectable New York area.



FOR SALE—50′ Enclosed Bridge Cruiser. New Superior Diesel 1940. Completely refurnished and redecorated. Condition A 1.

Fine Selection of Used Boats Offered For Sale

POWER BOATS

16′ Coupe Yacht Tender from our Designs ▪ 24′ Custom-built Sedan fisherman ▪ 29′ Chris-Craft Express Cruiser—New 1938 ▪ 30′ Sedan Cruiser. New 1936. Two Chryslers ▪ 30′ Wheeler Sedan. New 1937. One Chrysler ▪ 30′ Reliance Sedan. New 1941. One Chrysler ▪ 32′ Vinyard Sedan lap-strake sport fisherman. Two Chrysler engines new 1942 ▪ 32′ Custom-built lap-strake sport fisherman, new 1940. Two Chryslers. Many extras ▪ 34′ Matthews DeLuxe Sedan. New 1941. Located on Great Lakes ▪ 38′ Matthews Cruisers—several, various types and ages ▪ 39′ Consolidated. New 1935. Two Kermaths ▪ 39′ Wheeler. New 1936. In A 1 condition ▪ 40′ Consolidated. Two Speedways. Location Florida ▪ 50′ Elco enclosed bridge (several) ▪ 55′ T.S. Diesel Cruiser. New 1937.

SAIL

25′ Mahogany Day-Sailer ▪ 26′ Aux. Sloop. New 1937 ▪ 30′ Warner Sloop. New 1938 ▪ 32′ Alden Cutter. New 1935 ▪ 39′ Warner Cutter. New 1942 ▪ 41′ Roue Cutter. New 1935 ▪ 45′ N. Y. 32 Sloop. New 1936 ▪ 50′ Racing and Cruising Cutter ▪ 70′ 12-Metre Sloop ▪ 49′ Alden Schooner ▪ 45′ Keel Schooner with doghouse ▪ 52′ Shallow draft Schooner ▪ 52′ Racing and Cruising Schooner ▪ 70′ Marconi Schooner ▪ 76′ Aux. Schooner ▪ 43′ Casey Yawl ▪ 44′ Yawl. New 1940 ▪ 50′ Lawley Yawl, rebuilt 1941 ▪ 32′ Marconi clipper bow Ketch.

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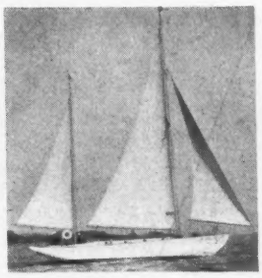
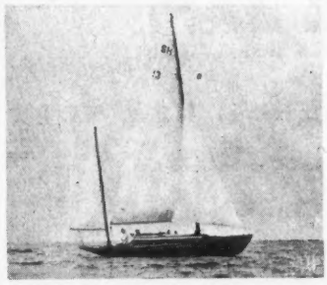
For Sale: **No. 5129,** "Eastward Ho" aux. sloop 32′ x 9′ 7″ x 4′ 9″, built 1940, sleeps 4. Quality boat beautifully kept. Laid up on Cape Cod.



For Sale: **No. 200,** Aux. ketch 37′ x 10′ 10″ x 4′ 11″, designed by S. S. Crocker. Present layout accommodates 3 with galley aft. Reasonably priced. Located in Maine.



For Sale: **No. 4970,** Deluxe model Single Hander yawl, used only 3 short seasons. 35′ x 8′ 6″ x 5′ 3″, sleeps 4. Good complement of sails and equipment.

Other Suggestions

44′ o.a. prize winning yawl, Great Lakes location.

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50′ twin-screw Diesel Dawn cruiser, near Boston.

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43′ 6″ o.a. auxiliary cutter by Estate.

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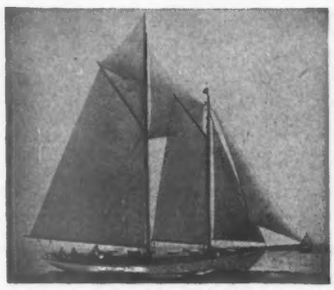

52′ Post-Built Alden Schooner

No. 2222 — 38′ Cruising cutter, rebuilt in 1939. Will sell for less than cost of rebuilding.

No. 2933 — 45′ V-bottom express cruiser with deckhouse. Pair of 180 H.P. Speedways. An old boat, but a good one. Make offer.

No. 2845 — 47′ Cruising ketch, moderate rig, 4-cylinder Kermath. Beamy and comfortable. Excellent cruising boat.

No. 2407 — 25′ "SEA-GOIN" motor sailer, slightly used as a demonstrator.

No. 3001 — 38′ Chris-Craft express cruiser hull, priced low for quick sale.

47′ Twin-Screw Post-Built Cruiser

No. 4239 — 46′ Fisherman type hull, recently rebuilt for sport fishing. Has deckhouse and is powered with Mystic Model Lathrop motor.

No. 2888 — 47′ Deckhouse double stateroom twin-screw cruiser with forward cockpit. All trim, teakwood; planked with mahogany.

No. 2957 — 32′ Fisherman type hull used as a party fishing boat; has helmsman shelter.

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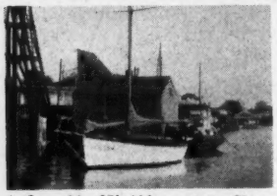
50′ x 14′ x 7′ 2″ — Alden job, built by Morse in 1928. Well kept, will stand any survey. A schooner with ample beam and sufficient draft to make her an ocean cruising yacht of the finest type. Accommodations very ample.

A fine 30′ Alden gaff headed sloop, a yacht of the finest construction. Condition extraordinarily good. Gray motor, dinghy, sleeps four, full headroom in cabin, large galley and toilet, fine cockpit.

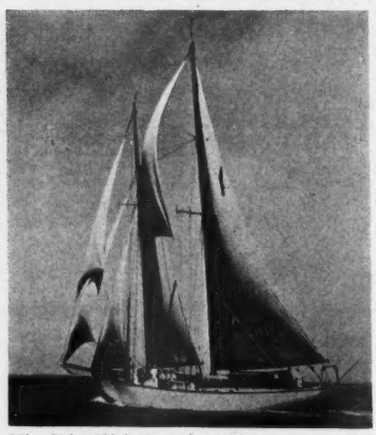
One of the finest of the available medium size cutters. A Rhodes designed, Palmer-Scott built, modern — last word in a fine boat. Auxiliary, lighting plant, very well equipped, sails like new, entire ship in fine condition. 37′ 3″ x 9′ 10″ x 5′. Located Newport News.

A beautiful Alden 35′ ketch, condition like new, yacht having been perfectly kept, built in 1937, but looks like a new boat now. Sleeps four in two cabins, auxiliary equipment ample and in good condition.



A fine able 35′ Alden cutter. Sleeps four, large galley and toilet. 35′ x 11′ 3″ x 4′ 10″, a Gray motor. Sails like new and yacht in fine condition. A large galley, Shipmate and alcohol stoves.

We consider this to be the finest yacht her size



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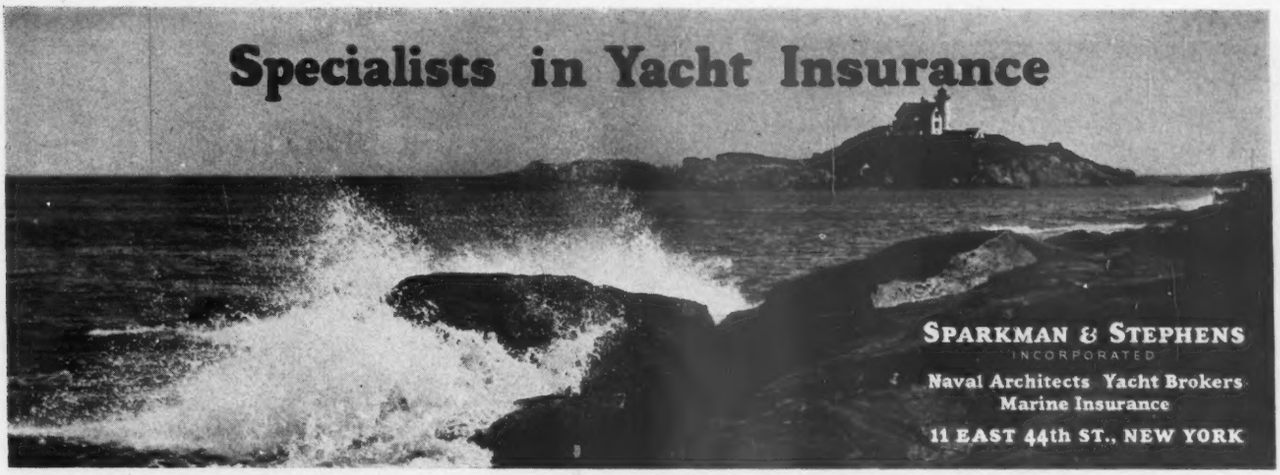

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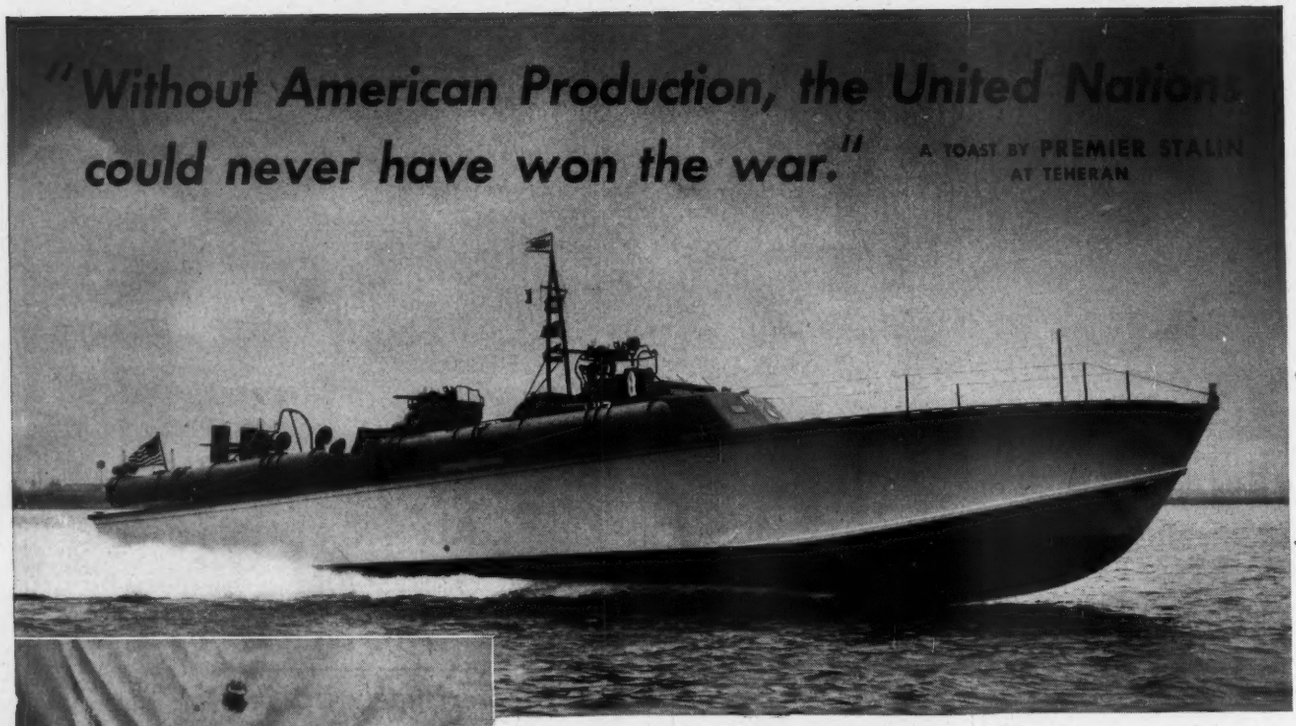

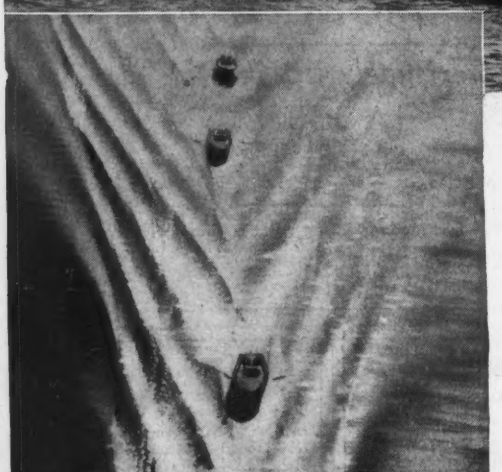

OFFICIAL U. S. NAVY PHOTOGRAPH

STALIN is known to be a man of few words—never given to unjustified praise. That he should single out American war production for one of his rare tributes is further proof of the effectiveness of the supplies and machines of war that are pouring from our yards and factories.

As the Soviet Premier has pointed out, the miracles of production performed by American enterprise have been among the outstanding contributions to the United Nations' success. Here at Elco we have watched our own production miracle take place—are seeing the results translated into daring deeds and thousands of successful routine missions completed against the enemy by Elco PTs.

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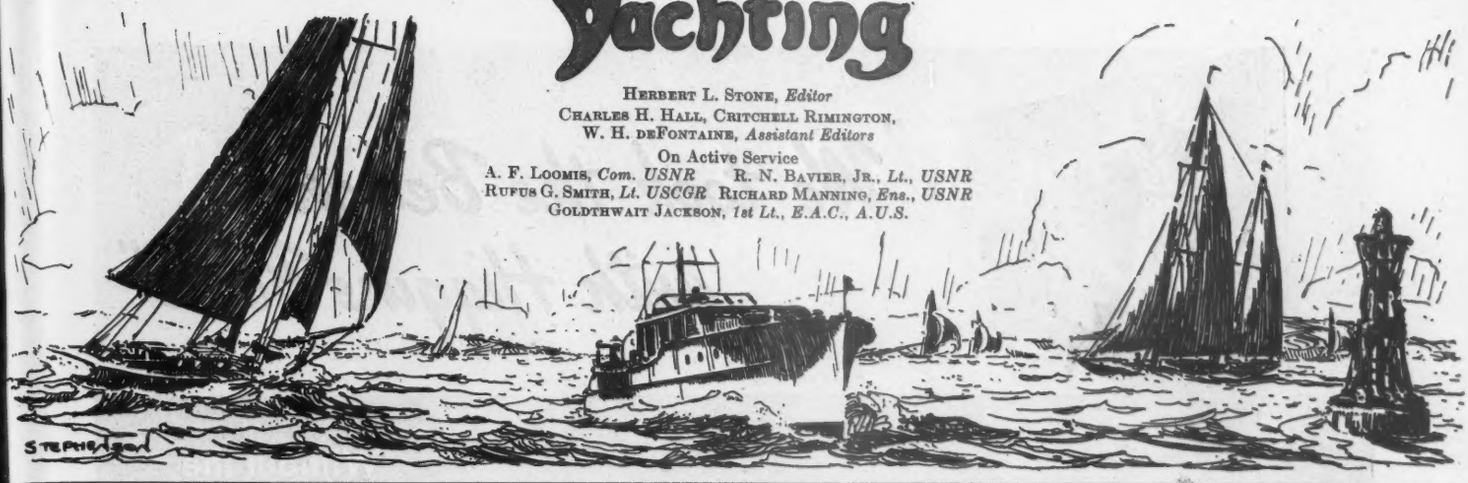

VOL. LXXV JANUARY, 1944 NO. 1

AFTER THE WAR, WHAT?

TRYING to look ahead and see what the future may hold is something everyone is tempted to do, especially as it may help in charting the course of things to come. But however strong the urge, prophecy is frequently fraught with danger. To do so is to stick one's neck out, for prophecies have a way of never being fulfilled. However, if one did not keep a good lookout and try to pierce the mist and fog ahead, any ship he sailed would be headed for trouble.

In this issue of YACHTING, we have tried to look ahead as far as it is possible to see. To aid us in this, we have called upon the cumulative experiences of those whose work in the past best qualifies them to judge of what lies ahead. These are the naval architects, boat builders and those in the allied industries who have so successfully charted the courses that led us through the past years and produced the highly developed yacht of the late pre-war era. What these persons think should be a pretty good guide for the future.

As to the *desire* to get afloat after peace comes, and the demand for boats for recreation, everyone seems pretty much in agreement that there will be a swing back to the water such as has never been seen before. As to changes in the boats themselves, and the methods of building them, it should be noted that past experiences lead one to conservatism. There will be changes, of course, but in the line of orderly development and progress rather than in any revolutionary overturn. Any dreams of an overnight shift to radical design and new and untried methods of boat building are not apt to be fulfilled except in the smaller sizes, say up to 18 or 20 feet of length.

Those who follow the sea, either for livelihood or for pleasure, also are conservative. They cling to what the past has shown to be good. What they demand in a boat, first of all, is seaworthiness (which means safety), and the past has pretty well convinced them what elements in a boat make for this. Thus they cling to certain features in hull, rig and power. The known is trusted more than the unknown. When one's life may depend on a vessel's performance under trying conditions, one hesitates to discard the tried for the new and untried. Hence, the hull of the future will probably follow pretty much the form of the past. Rigs of proven merit will be chosen over those whose chief claim is novelty, even if the latter promise much. Power must be positive — tested through long use in the past.

And, lastly, there is the matter of looks. One gets to judge a boat by her appearance and the sailor looks for certain things that he is used to seeing. Extreme streamlining, too great an emphasis on lightness of superstructure, too much use of glass, too light spars and gear may make for efficiency but, unless they satisfy as to strength, seaworthiness and utility as well, they will not be readily accepted. Therefore, boats must still *look* like boats. A sailor demands that "You make me a ship as looks like a ship an' I won't ask for more."

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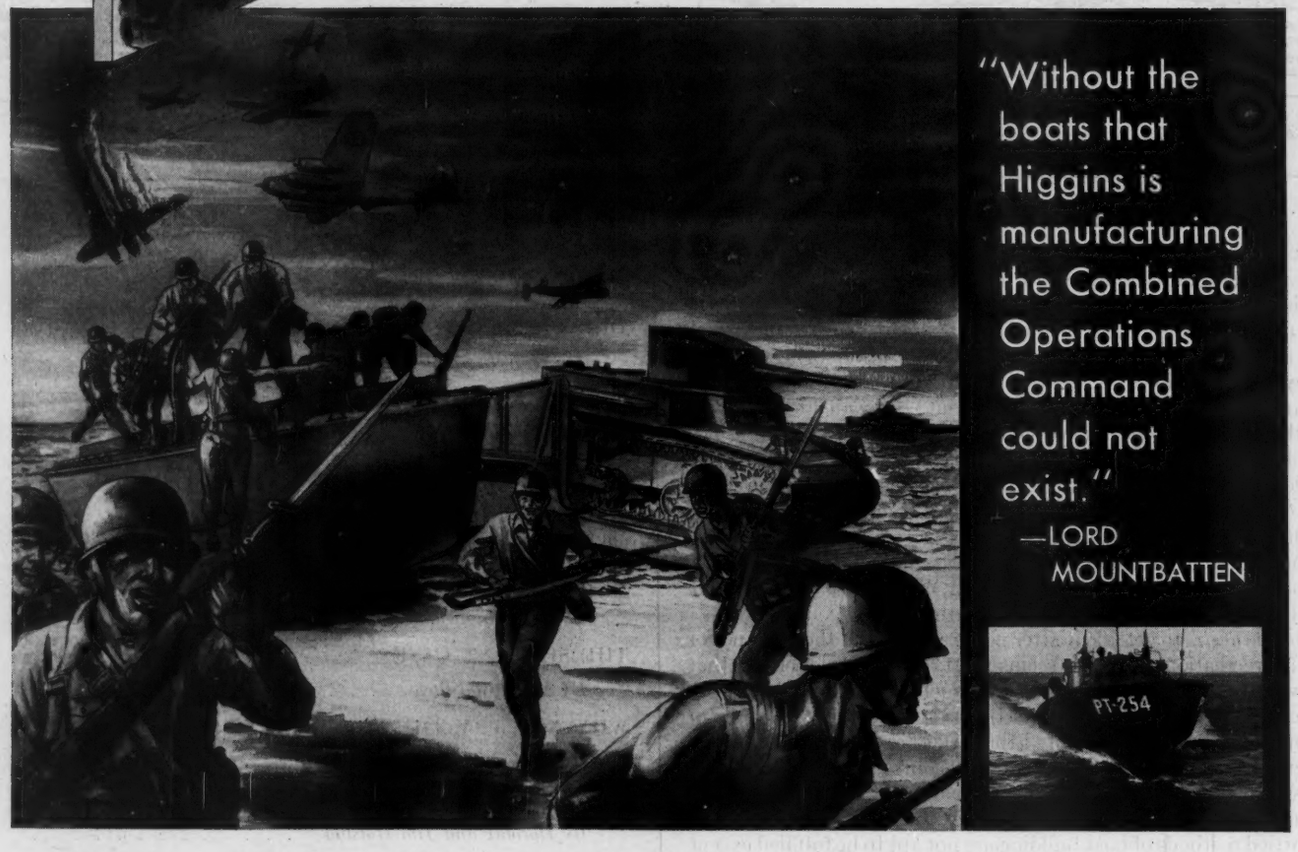
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WHAT OUR READERS SAY

A YACHTSMAN'S LAMENT

Editor, YACHTING:

▶ I think you will be interested in the following letter which I have just received from Pfc. S. R. ("Bing") Mink, who has often been aboard my cruiser *Joell* (her home port is Essex, Conn.):

"Dear Skipper:

"Upon further study into the July issue of YACHTING I read an article entitled 'Wartime Cruising' which mentioned Essex and Hamburg Cove. That article made me mad, envious, and nostalgic at one and the same time. Of all the copies of that cursed magazine I buy, this one has to have a lengthy article dealing with a dump named Essex. So, as I said, I'm fit to be tied, and eager to get this damn mess over with so a guy can settle down to some fun-work and leisure.

"But I imagine that you will have the same reaction, and probably more so because you own a vessel. Me, I ain't got no boat; not even a snail in a bottle that I can claim once held fast to me scuppers. I feel just about as forlorn as one of those YACHTING ads selling a good shipyard site looks. Boats, boats, boats. . . . BAH. . . . rich man's playthings, pocketbook drainers, they stink, they get dry rot, they need continual upkeep, they are hard work (stinkpots anyway), they breed jealousy and contempt among mankind, men fight over women for them, wimmin fight over men for them, they are cantankerous, moody, they leak, get fouled up, run aground, need paint and varnish and oil and gas, they need wind . . . hmmm . . . shouldn't have mentioned that point! ! . . . they get rusty, dirty, seaweed thrives on their bottoms, they need certificates, permits, coupons, rules, papers, licenses, charts, instruments, food, water, alcohol (both varieties), canvas, dinghys, hands, — *but I love 'em.*"

FRANCIS L. HASKELL

SAILING AND RACING IN ENGLAND

Editor, YACHTING:

▶ This is my first visit to the U. S. A. and I have been made so very welcome here by American yachtsmen that I should like to say a few words about sailing conditions in England, both for general interest for people over here and especially for any American yachtsmen that may be called over to Britain.

Of course, deep water sailing has quite stopped and so has practically all coastwise and estuary sailing. That leaves us only inland waters, and even they are restricted by defense regulations. Large sheets of inland water, which might have been used by invaders, are still mostly closed; so, too, are all ports. There is no gasoline at all, and if we can not walk, or cycle, or if it is anything more than a very short train journey, we just can not get to our boats. That leaves us just the inland waters free from the defense regulations, and within easy reach of some large town. As you can guess, there are not many clubs which fall into this category, but what there are do their best to make good the loss.

A typical example of one of these clubs is the Ranelagh Sailing Club. It is situated on the Thames at Putney, right on the famous Oxford and Cambridge boat race course, in the Metropolitan area, which is only half an hour's run from the center of the City of London. There is a whole string of regulations we have to comply with and permits to be signed, but we get through them. We sail 12′ National Dinghies, a smaller and cheaper edition of the 14′ Internationals, on the Thames. There are over four hundred of these 12s in Britain, with very little to choose between any of them, so we get good close racing.

We, at Ranelagh, get good starts, the average must be something like a dozen. I remember one race since the war with twenty-three, and there may have been even larger starts. We sail both winter and summer; having had about fifty races this summer, and another twenty scheduled for the winter. Rain, snow, fog — we still sail. I remember once, in the early days of the Battle of Britain when we had daylight raids over London, the air raid sirens went just after we had started. Well, there was a good sailing breeze and the gun fire sounded pretty far away. We did not think any German planes would bother to come down and machine-gun a few small sailing boats so we just sailed on, and a very good race it was too.

I expect you are saying to yourself, "England at war, how do they find time to do all that racing?"

Well, this is how it works out. I have a dinghy at home — her name is *Hurricane*. Whenever I get a bit of leave the first thing I do is to make for the Ranelagh Sailing Club; but since I am in the Navy, that is not very often. When I am out of the country, I tell the Sailing Secretary that anyone who is a member of any well-known club, anywhere in the world, can sail *Hurricane*, providing, of course, that the Secretary can trust them not to break her up.

If my plans have worked out right, I expect that my dinghy is now being sailed by an American officer who is stationed in London. Anyone who is keen on sailing can go to almost any sailing club in Britain and, whether he is a member or not, can be sure of being made most welcome, and will, most likely, get a sail. This man who is sailing *Hurricane* has been in England for some time. He had wanted to sail but had not known how to go about it, and nothing happened until I met his friend and sailing partner over here and offered my boat. There are probably many other similar cases, all of which could be avoided. Anyone going to Britain, or who is there already, should make a point of getting in touch with the nearest active sailing club; if one cannot be found, a letter to one of the British yachting papers will bring the address of the nearest one. Most British sailing clubs today regard it as part of their duty — part payment for the privilege of being allowed to sail in wartime.

F. GORDON BAILEY

H. M. S. Asbury,
New York, N. Y.

YOU CAN'T LOSE A SAILOR

▶ The following is an extract of a letter from a soldier in the U. S. Army overseas to his parents:

"Dear Mother and Dad:

"The best thing in all the packages, of course, was the YACHTING, but I'm not sure whether it was a dirty trick or not. Two things I *am* sure of. First, it gave me that old feeling, and second, that it is going to cost you money. Please enter my subscription to YACHTING — see what I mean? Here I've gotten along for ten months without seeing an issue of it and had just about gotten to the point where I could do without it — and then you shattered my carefully built shell with one blow. Anyway, thanks a lot."

PVT. A. R. WHITMAN, JR.

(*Known to his buddies as the "Army's sailor." Ed.*)

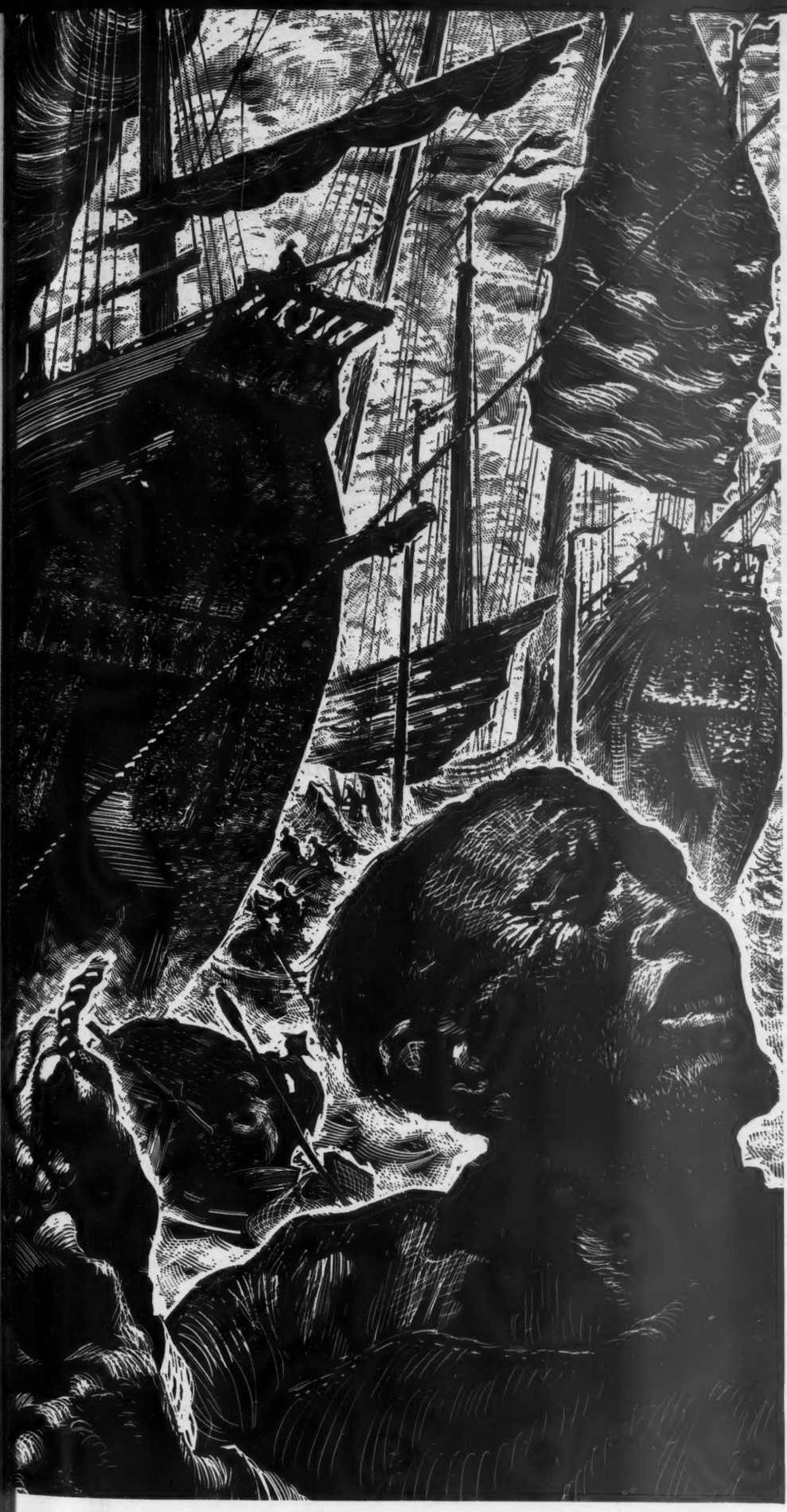
SOMETHING NEW IN ONE DESIGNS

Editor, YACHTING:

▶ Postmarked September 4th, an airmail letter from Gordon Raymond tells of his present duty as a Flotilla leader, shifting troops from North Africa to the beaches of ——. His "afterguard" now comprises about 50 officers and some 400 men and a One Design fleet of landing craft.

He may have had in mind the much abused bromide attributed to Wellington, that the battle of Waterloo was won on the playing fields of Eaton, when he intimates that he now continues, on a larger scale, the technique acquired and required to get into and out of the club launches at Larchmont during Race Week.

Providence, R. I. GEORGE F. GILMORE



GUNG HO

Gung Ho! Work Together! When Carlson's Raiders took the Japs on Guadalcanal and Makin, they took their slogan and tactics from the fighting men of China.

Sailing men, too, millions of them, for there are probably more boats in China than in all the rest of the world.

Theirs is the centuries-old tradition of one of the earliest seafaring nations. No more worthy seacraft anywhere than their colorful junks and sampans. No more skillful boatmen than these descendants of ancient mariners whose ships ventured blithely to distant marts of the Middle East, and embodied many principles retained in modern yacht design.

Endlessly ingenious, in war as in peace, the Chinese have taught the world new meanings for *courage* and *endurance*. Japan's "victories" they turn to ashes, "occupation" to one long nightmare. Our airmen and foot soldiers pay high tribute to these expert fighters.

Gung Ho! Gallant China! We'll work together, win together. Fighting Allies! . . . Fellow Sailors!

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IN THE WIND

▶ Mrs. Jean Sutphen, sailing Jack Sutphen's *Rum Dum*, was the high scorer in the winter season regatta at Larchmont, collecting 26 points in three matutinal contests. . . . The way the gals keep *showing the way* to the meeker sex these days gives one pause for something — possibly a drink. . . .

But a lot of men have come to the conclusion that women who are interested in yachts and tans are more interesting than women who are interested in pots and pans. . . .

▶ There's a wave of tattooing among the Waves, according to a tattoo parlor operative in Washington. . . . Mr. Van Kilpatrick reports that he has operated on several ladies of the Navy who desired to have their serial numbers tattooed just above their right knees. . . .

That's the only sort of *needlework* the nautical gals are interested in any longer. . . .

▶ Unless Lend-Lease officials do something about it pretty quickly, a bunch of French WACS will have to do their drilling at the *Folies Bergere* or some other appropriate place, for when they got their uniforms they discovered there were the correct number of blouses — but no skirts. . . .

▶ Down in Cuba, I'm informed, the populace is putting a mixture of four parts rum to three of petrol into their gas tanks. . . . And here — unless I miss my guess — we're putting something very similar into our cocktail shakers. . . .

▶ A British captain, who made a poor exhibition of docking his cruiser under the eyes of an admiral, braced himself for the reprimand he momentarily expected to receive from his superior. . . . Half an hour after the incident he was handed a message containing but one word — *Good.* . . . He was torn between relief and bewilderment; went into his shower to think the matter over. . . . As he emerged from his bath, he got another one-word communique — *God!* . . . Thus the *delayed action verbal bombshell*, secret weapon of senior officers present, had its first trial, with shattering effect. . . .

▶ While there was presumably little blowing at the meeting of the Big Three, there was undoubtedly a lot of puffing. . . . Wonder if anyone told Joe to put *that* in his pipe and smoke it. . . .

▶ Some critics of a Famous Incident in the Army feel that the general in question should be ordered to *lay that pearl-handled pistol down.* . . .

▶ Incidentally, the way the boys went into action in the last Army-Navy game you'd have thought they represented the army and navy of a couple of countries at war . . . Annapolis and West Point officials ought to realize that we, the taxpayers, expect their pupils to do their commando stuff in battle — not on the gridiron. . . .

▶ That astonishing lady who survived a fifty-two day ordeal in a lifeboat a year or so ago came into the news again the other day through the fact that she had been awarded the British Empire Medal for Gallantry at Sea. . . . She's Mrs. Margaret Hope Maberly Gordon. . . . She was the only woman in one of six lifeboats that got away from a passenger ship sunk in the South Atlantic. . . . She and the third officer alternated in standing watch and steering, while, one by one, every other person aboard the craft died. . . . The officer subsequently was killed when his ship was torpedoed as he was returning to England. . . .

▶ Some fine wines and liquors were displayed and sold in town recently, and the fact was of interest to yachtsmen because they came from the cellar of the late Henry Walters, famed as the owner of *Narada*, most graceful, and one of the most sumptuous, steam yachts that ever flew the New York Yacht Club's burgee. . . . Many were the parties given aboard *Narada* in Newport Harbor and other glamorous Corinthian havens. . . . For years she was laid up for the winter at New London and was a familiar sight to passengers on the New Haven trains. . . . A gallant vessel, symbolic of an era that was proud and patrician and plutocratic — but which had a distinction and elegance that will never be matched in our time. . . .

▶ James G. Dale of Rochester, N. Y., requests that the attention of Great Lakes Corinthians be called to a splendid project which the Administration is hopeful of undertaking shortly and for which Congressman Luffline, of Chicago, and Senator Crojacques, of Michigan, have introduced the necessary bills (H Int. No. 7-11; S. Int. No. 23). . . .

"For years, and longer," Mr. Dale points out blandly, "our friends on the seaboard have held us inferior because we are merely fresh water sailors. . . . Though their feeling of superiority is entirely unjustified, nevertheless it piques us. We also realize, quite frankly, that our sailing would be vastly more pleasurable if we had salt water under our keels. . . . Hence, all Great Lakes sailors should urge their Congressmen and Senators to vote for this legislation, which, in brief, is designed to make the Great Lakes salt. . . .

"The salting project is eminently practical," continues Mr. Dale unctuously, "due to the application of a new discovery (more of which below). It also is international in scope, due to the fact that Canada will participate. The Treaty for the St. Lawrence Waterway provides for the construction of tremendous hydro-electric power plants. The *seasoning* plan will use a few of the resulting kilowatts to pump salt water from the Gulf of St. Lawrence into the Great Lakes . . . What could be simpler? . . .

"Technicians of the Rubber Board," explains Mr. Dale urbanely, "have ready a non-corroding synthetic for the pipeline which will carry the sea water up the river and across the corner of Lake Ontario to Trenton, Canada, where it will be discharged into the Trent Canal to flow thence into Georgian Bay and Lake Huron. The natural evaporation occurring during the passage of the water through the canal will increase the saline content per gallon, while the easy gradient of the canal will save the expense of the sheet lift over Niagara," chortles Mr. Dale limpidly. . . .

"Lake Michigan sailors will understand," he declares optimistically, "that the relative specific gravities of fresh and salt water assure dispersal of the latter into Lake Michigan via the Straits of Mackinaw."

I understand the anti-fouling paint people are getting back of this project and that a number of industrial combines are being formed for the purpose of setting up plants for the conversion of salt water into fresh in the various cities and towns in the Great Lakes areas. . . . Only a few selfish people who don't sail are reportedly opposed to the whole idea, and they are mostly allergic to salt. . . .

▶ According to the average wife, the only time her husband was ever lucky was when she married him. . . .

▶ The expression "all at sea" probably sprung from the all too familiar (to sailors) fact that when you're afloat it's usually easier to get *in* a fix than to get a fix. . . .

▶ W. P. Stephens, grand old man of yachting, attended the sixtieth opening of the Metropolitan Opera season last November. . . . At the age of 29, he had attended the original opening night in 1883. . . . Indicating the endurance possessed by a devotee of sailing, no doubt. . . .

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YESTERDAY

TOMORROW

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AROUND THE CABIN LAMP

Ice and the "Nautilus"

▶ The no'theaster howled — dropping to a whisper, rising to a shriek — and the great wet snowflakes began to grow harder and to strike the skylight with a faint tapping as of tiny, drumming fingers, instead of the soft whispering touch of a half-hour before. It was snug in the cabin of the *Six Bells*, as she lifted slightly on the rising storm tide, or rolled gently as the gale swept through her rigging. With lines all fast to the pier, and all gear snugged down on deck, there was little to be done save what her crew were doing for the time being: sitting around the red-hot stove below, smoking, playing cards and talking things over.

"On just such a night as this," remarked the Skipper, "the *Nautilus* was lost. That was over forty years ago; I remember it well."

"The *Nautilus*? Lost?" demanded the Number One doryman. "She wasn't lost, she rotted down at her pier. Old Capt'n Bartlett lived in my home town and I remember seeing him standing on the dock, looking at his schooner's masts, sticking up out of the water in the slip!"

"She was lost, just the same," growled the Skipper, "and I can give you all the details. It might not be such a bad idea if some of you young squirts under forty would learn to listen to your elders once in a while, too!"

"Well, I remember those masts as if it was yesterday," persisted the doryman, "and how the hell could a vessel's masts come home without the vessel?"

"They can and, by Godfrey, they did, in the *Nautilus*, and I'll tell you how!" snapped the Skipper.

"I remember that season well. I was about thirteen years old and I cut bait and hauled the forrad line on the *Nickerson*, halibuter, that fall. I got some bad gurry sores on my arms and laid off a trip, so I happened to be ashore when old Capt'n Bartlett and his men landed. I was there three days later, too, when the damndest surprise hit that village that the people had ever known!

"The *Nautilus* was a Georgesman, and her Old Man was famous for running offshore. It was true that he had unusual luck, but he took unusual chances. People don't realize today that, forty years ago, and even less, a Georgesman took his life in his hands when he let go his lines from the fish pier. If you look up the files of old newspapers, you'll see that almost every issue in the 'longshore papers carries the account of some poor cuss being washed off the bowsprit. When they got caught down to loo'ard on the edge of the Bank — well, sometimes they found a few splinters but more often there was nothing to account for a schooner and her crew.

▶ "The *Nautilus* had pretty well taken her catch and was on the outer edge of the Bank when the easterly breezed up. Normally marketing in Boston, there was just enough northing in the wind to make it a ticklish proposition to work up the edge of the shoal to bold water; on the other hand, the sea began to rise and add to the problem of standing off with a quartering wind to go around the Bank, but that's what he had to do.

"You cream puffs who think y'are sailors today can't realize what sailoring was like in those times. You make passage in a fisherman now, with all hands under cover, even the man at the wheel, and with searchlights, heaters and God knows what to help out and, on top of that, no canvas showing but a little riding sail. 'Twasn't much like that aboard the *Nautilus*, wallowing off before a gale, with her hold full of fish and the Old Man wondering whether she was making too much leeway to clear the Bank.

"She ran under a goosewinged mains'l and the head of her forestays'l; that was all that she could stagger under and it wasn't enough really to handle her with, under such conditions. Every rope yarn aboard of her was iced up to the size of your arm, the snow and sleet had coated the sails, and the weather sides of the masts and spars bulged with ice. She buried herself practically every other time she ran on a sea, and her decks were full of water and slush, while the ice made faster and faster on deck and sides.

"They had lifelines run fore and aft, and lanterns hung in the rigging. Every half hour or so, men would work out on those lines and pick away at the ice with axes, trying to lighten her a mite, and the man at the wheel would begin to stiffen up with the cold in about fifteen minutes. For it was snowing hard, the flakes driving and cutting like sand, and the wind kept blowing harder and harder until, even with the scraps of canvas that she was carrying, the schooner was sailing on her beam ends half the time. That was what worried the Old Man, because he knew that she would slide to loo'ward for fathoms every time a puff hit her.

▶ "Well they drove on, hoping, maybe praying a little, and working as hard as men can work, until frostbites, bruises and a couple of men with ribs broken when they fell, pulled the crew right down to a bunch of exhausted cripples. They kept on trying to do what could be done but their efforts became less and less and, when the night had passed and the Old Man knew that they had cleared the Bank, the *Nautilus* was just a floating iceberg. Her masts and shrouds were sticking up out of the ice, the bowsprit showing in the same way, and a lot of numb, half-dead lumps moving slowly on deck, to represent the crew. A sea had smashed the fo'castle companionway and filled the place with water and broken ice; they'd plugged the opening as best they could and improved the job when daylight came, but it robbed them of one shelter and a fire. Water had washed into the cabin, too, through a smashed skylight, and, freezing around next to her skin, had turned the place into a cave of ice. But they did keep the fire going and took turns at dodging below to get warmed up a little. Oh, she was a mess and no error, but the wind began to drop!

"They couldn't get any more sail on her but they laid a course as they were and, somewhere off Nantucket, a revenue cutter, which you young lads wouldn't know anything about, raised her and took her in tow. They chopped off the halliards but the sails wouldn't run down, being frozen as stiff as boards and thick with ice and snow besides, and in this shape they towed the *Nautilus*, reeling and wallowing, through the rafts of drift ice that lay all the way from the edge of the shoals inshore. She was something that looked like anything but the trim schooner that had sailed a couple of weeks before.

▶ "Naturally, there was considerable interest shown when the cutter brought her prize in and landed the crew. They had all been thawed out and, barring a few tender spots from the frostbites, and the bruises and broken ribs, you might say that all were well and hearty. But the gale was still breezing to some extent and it was still bitter cold. The *Nautilus* was just a blasted berg and they figured that they might just as well let her lay until the weather changed and moderated some. The only place where they could make a line fast was around her masts, several feet up from the deck, for bitts and windlass were all buried under Lord knows how much ice. The cabin, too, was all ice, for the fire had burned out when the crew was taken aboard the cutter and the cutter men, who steered the tow, hadn't bothered to keep it going. So they made her fast in a vacant slip and waited for weather. The Old Man came down every morning and took a look but, for several days, there was no change in temperature; the wind had hauled nor'west and it was just as cold or colder. Then one night the wind hauled southerly and it rained in torrents. Everything was afloat, and melting ice ran in the gutters and off the ends of the docks. It seemed as if the *Nautilus* would be cleared and the Old Man was on deck bright and early to have a look. He got one!

"Two masts, leaning cockeyed, stood in the water of the slip, the mooring lines were still fast to the wharf bollards, and the sails were sagging on the spars which were laying afloat.

"Of course, all hands concluded that she had filled and sunk and they got busy with a lighter at once. But, when they tried to make fast, there didn't seem to be anything there! They got pretty excited, and investigated to the limit, but it was a fact, there wasn't any hull at all under those masts!

(Continued on page 156)

A brave seaman named Frazer...

When Stephan Decatur's brother, James, was shot through the head by a giant Tripolitan captain, Decatur, wild with rage, lunged through the smoke and aimed a cutlass blow at the pirate's head. The Tripolitan parried. Decatur's cutlass snapped to the hilt. Down they went, the giant on top, each grappling for the other's throat. With one hand free, the pirate swung a scimitar, but at that moment, *a brave seaman named Frazer* ran in and took the blow. Decatur, thrusting a hand in his pocket, fired his pistol through the cloth, killing the giant instantly.

Such heroic action as that of seaman Frazer in 1804, is typical of the many incidents that are taking place in this war. Quiet, unassuming, American boys, with unwavering zeal and great courage, die in battle . . . in keeping with the tradition of the Naval Service. They are doing a big and dangerous job, and it's our duty to help them out at home. Volunteer to join the U. S. Coast Guard Temporary Reserve . . . ask your Coast Guard officials how you can help. Keep your boat and its equipment shipshape. And remember that War Bonds will speed the day of quiet pleasure sailing.

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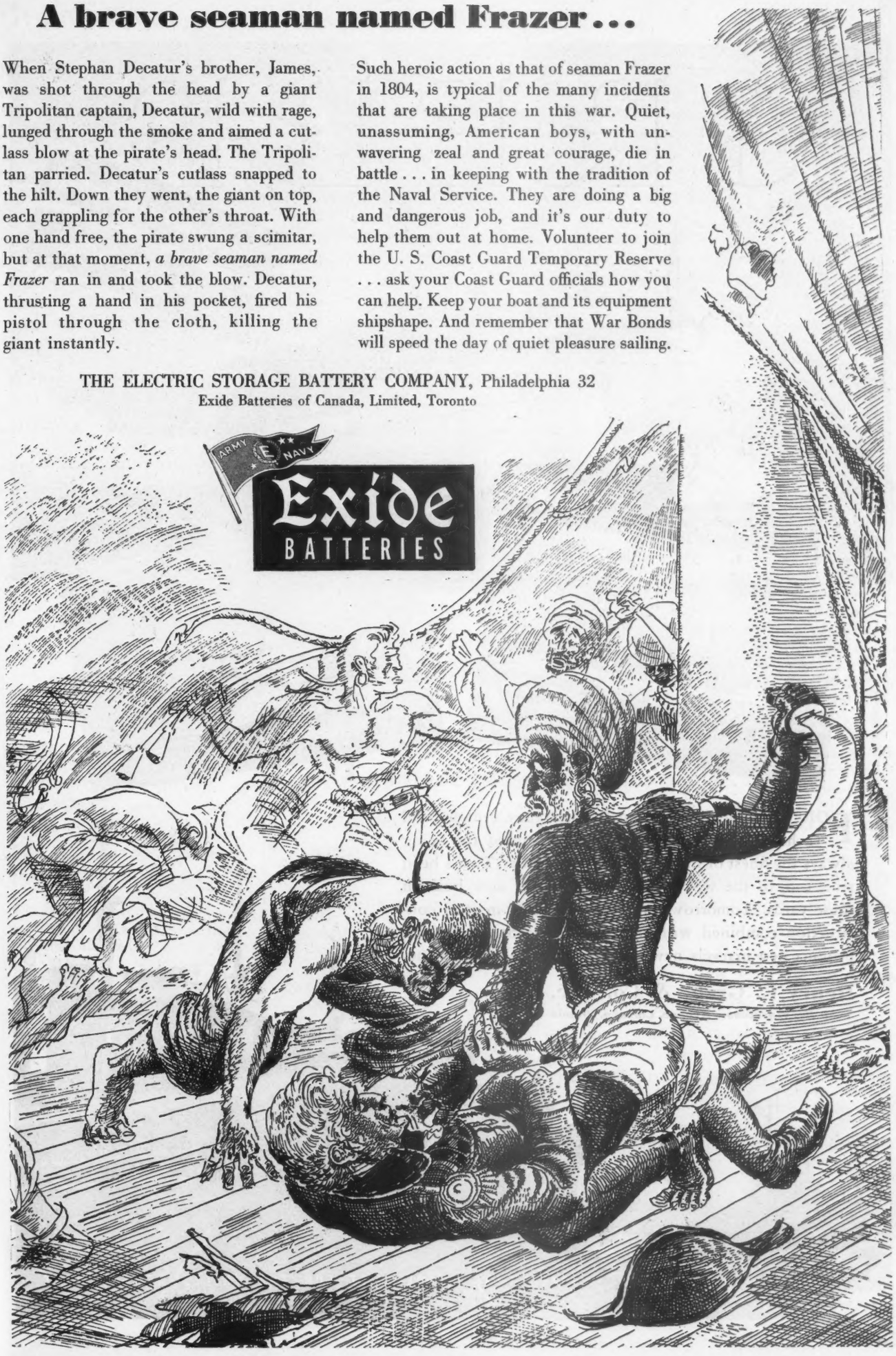

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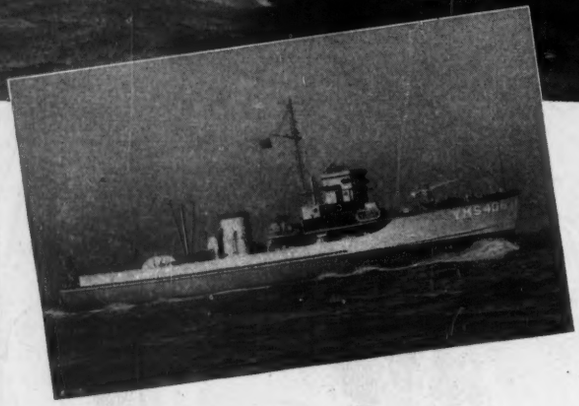

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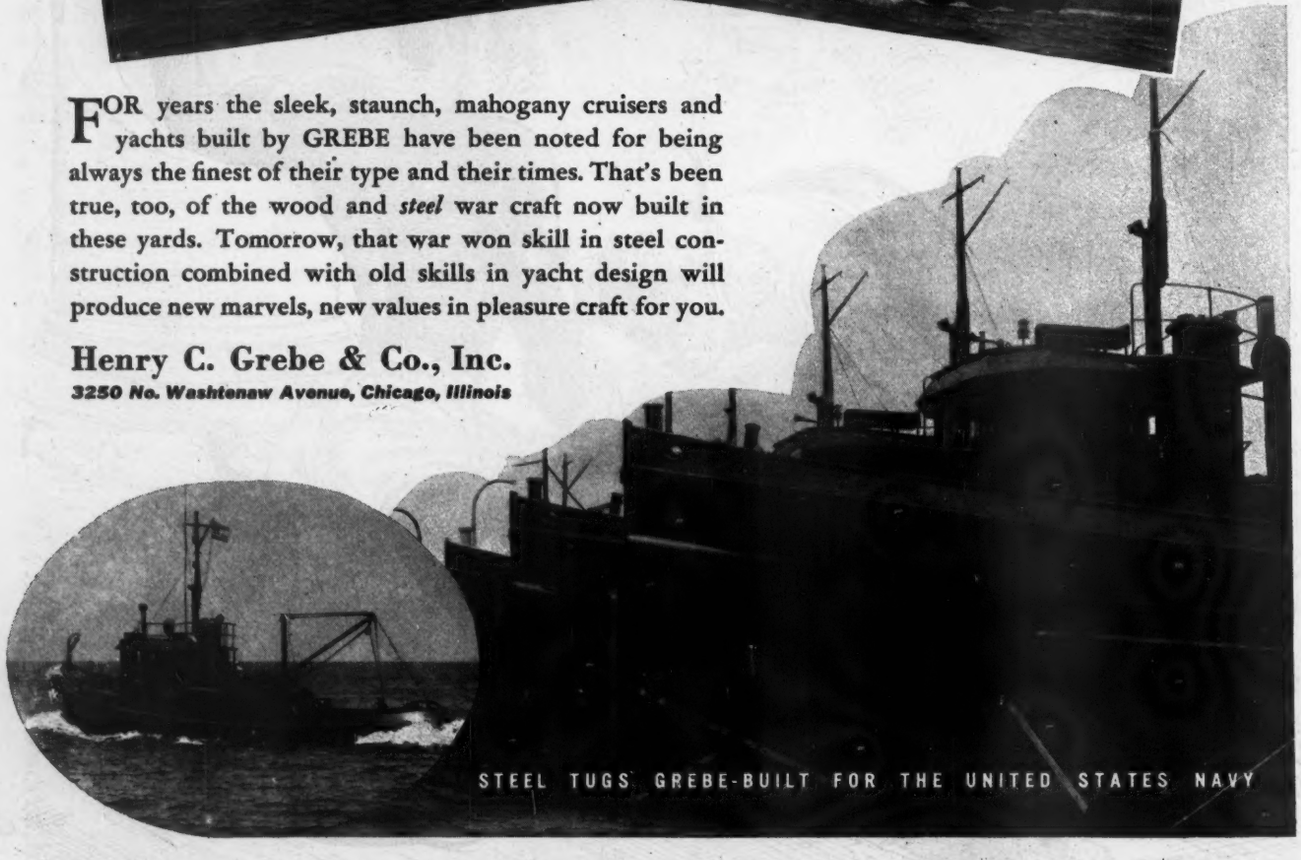

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NAVAL WARCRAFT DESIGNATIONS

For purposes of naval classification, all vessels in the United States Navy (other than motor yawls, small launches, etc.) are designated by alphabetical symbols. Viz., coastal minelayers are designated as CMc.

AD	Destroyer Tenders
AE	Ammunition Ships
AF	Storeships
AG	Fleet Auxiliaries (Misc.)
AH	Hospital Ships
AK	Cargo Ships
AL	Lightships
AM	Minesweepers
AN	Net Tenders
AO	Oilers
AP	Transports
APA	Modified Transports
APc	Coastal Transports
APD	High Speed Transports (Converted destroyers)
AKA	Modified Cargo Vessels
AR	Repair Ships
AS	Submarine Tenders
AT	Tugs — Ocean Going
AV	Seaplane Tenders
AKD	Deep-Hold Cargo Ships
AKI	General — Stores — Issue Ships
AKV	Aircraft Supply Ships
AMb	Harbor (Base) Minesweepers
AMc	Minesweepers — Coastal
AOG	Gasoline Tankers
APL	Barrack Ships
APV	Airplane Transports
ARD	Floating Dry Docks
ASR	Submarine Rescue Vessels
AVD	Seaplane Tenders (ex-Destroyers)
AVG	Aircraft Escort Vessels
AVP	Aircraft Tenders (heavier-than-air)
AVR	Aircraft Rescue Vessels
BB	Battleships
CA	Heavy Cruisers
CL	Light Cruisers
CM	Minelayers
CMc	Coastal Minelayers
CV	Aircraft Carriers
CVE	Aircraft Carriers (escort)
DD	Destroyers
DE	Destroyer Escorts
DL	Destroyer Leaders
DM	Light Minelayers
DMS	Fast Minesweepers
PC	Submarine Chasers (steel — 170′, 173′, 175′ and 180′ o.a.)
PCE	Patrol Vessel Escorts (180′ o.a.)
PCS	Patrol Vessels and Chasers (wood — 136′ o.a.)
PG	Gunboats (over 1000 tons)
PF	Frigates
PR	River Gunboats
PT	Motor Torpedo Boats (70′ to 80′ o.a.)
PTC	Motorboat Submarine Chasers
PY	Converted Yachts (500–1000 tons)
PYc	Coastal Yachts (under 500 tons)
SC	Submarine Chasers (wood — 110′ o.a.)
SM	Minelaying Submarines
SS	Submarines
YA	Ash Lighters
YC	Open Lighters
YD	Floating Derricks
YE	Ammunition Lighters
YF	Covered Lighters
YG	Garbage Lighters
YH	Ambulance Boats
YM	Lighters
YN	Boom (net) Tenders
YO	Fuel Oil Barges
YP	District Patrol Vessels
YR	Floating Workshops
YS	Stevedoring Barges
YT	Harbor Tugs
YW	Water Barges
YAG	Unclassified Yard Craft
YCF	Car Floats
YCK	Open Cargo Lighters
YFB	Ferry Boats and Launches
YHB	House Boats (floating barracks)
YHT	Heating Scows
YMS	Motor Minesweepers
YMT	Motor Tugs
YNg	Gate Vessels
YOS	Oil Storage Barges
YPD	Floating Pile Drivers
YPK	Pontoon Stowage Barges
YRC	Submarine Rescue Chambers
YSD	Seaplane Wrecking Derricks
YSP	Salvage Pontoons
YSR	Sludge Removal Barges
YTT	Torpedo Testing Barges

LANDING CRAFT

LCM (3)	Landing Craft, Mechanized, Mk. III 50′ Tank lighter (lands one tank)
LCT (1)	Landing Craft, Tank, Mk. I Tank landing craft, Mk. I (lands several tanks)
LCT (2)	Landing Craft, Tank, Mk. II Tank landing craft, Mk. II (lands several tanks)
LCT (3)	Landing Craft, Tank, Mk. III Tank landing craft, Mk. III (lands several tanks)
LCT (4)	Landing Craft, Tank, Mk. IV Tank landing craft, Mk. IV (lands several tanks)
LCT (5)	Landing Craft, Tank, Mk. V 105′ Tank lighter (lands several tanks)
LCI (S)	Landing Craft, Infantry (small) British type raiding craft
LCI (L)	Landing Craft, Infantry (large) (Lands over 200 men) about 150′ o.a.
LCF (L)	Landing Craft, Flak (large) Beach protection craft (beach anti-aircraft fire)
LCB (D)	Landing Craft, Barge (British type)
LCB (M)	Landing Craft, Barge (motor) (British type)
LCS (S)	Rocket, or Support, Craft
LCV (P)	Landing Craft Vehicles (personnel)
LSD	Landing Ship, Dock
LST	Landing Ship, Tank Ocean-going tank landing craft, about 300′ o.a.
LVT	Landing Vehicle, Tracked (unarmored) Amphibian tractor (Alligator)
LVT (2)	Landing Vehicle, Tracked Amphibian tractor (Water Buffalo)
LVW	Landing Vehicle, Wheeled

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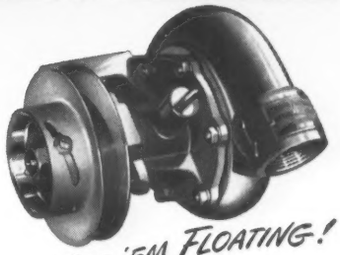

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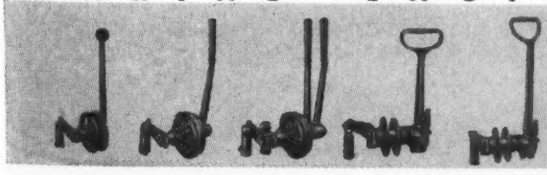
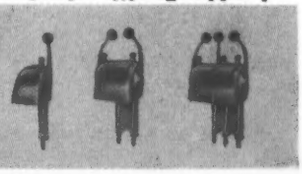


MARINE PRODUCTS THROTTLE AND CLUTCH CONTROLS . . . Surf raiding requires responsive, positive, easy control. No place for lumbering, laborious installations. No place for outmoded linkages, for distortion, binding or lost motion.



OFF JAMAICA

The many islands of the West Indies make the waters of the Caribbean a sailor's paradise

(From a Painting by Howard French)

YACHTING

Volume LXXV JANUARY • 1944 Number 1

(From a Painting by Howard French)

Was Anthony Fokker's much discussed "Q.E.D." a forerunner of tomorrow's yacht, or will the post-war yacht be of a more conventional appearance? Levick Photo

THE POST-WAR YACHT

The First of a Series of Articles on the Design and Construction of Tomorrow's Yacht, Based on the Opinions of Architects, Builders and Manufacturers

THE nautical fraternity, which has never been hard pressed for subjects of animated and oft-times controversial conversation, is, today, principally concerned with one all-engrossing subject — what of the post-war yacht? There are several schools of opinion. They range from the proponents of plastic hulls and Nylon sails to the conservatives who believe that there will be little, if any, difference in either materials or appearance; from those who envision tomorrow's cruiser (sail, auxiliary or power) as being the size of an overgrown dink to the devotees of the large yacht who have a firm conviction that pleasure craft in excess of 150′ o.a. will again be built. These are but a few of the endless range and ramifications of opinion that are invariably associated with this provocative subject.

The Editors of YACHTING, believing that the time was ripe to bring the whole subject up for discussion, recently decided to take the bull by its horns — or, shall we say, the tiller into their own hands — and to carry the matter into the open. Who were those qualified to discuss the matter? The yachtsmen themselves? Yes, but the problem of making an accurate sampling of their varying attitudes and opinions would be so complex that anything short of an owner-to-owner survey would be inconclusive and inaccurate. The alternative, and the one which has been followed, was to turn to those men who probably are the best fitted to speak for the yachting fraternity — the naval architects, the yacht builders, and the manufacturers of marine engines and equipment. To these men, who today are concerned with the nation's small warcraft, and who will in turn have the job of interpreting the desires of tomorrow's yachtsmen, went the request for a frank expression of what they believe will be the outstanding characteristics of the post-war yacht. And thereby hangs a tale.

The response to our request was astonishing. If the volume of mail we have received, and are receiving, may be taken as an index, then it may be confidently stated that the post-war sailor has much to consider and to look forward to. Every letter is so interesting and so full of ideas that YACHTING's original plan of dealing with the subject in one article had to be discarded. In order to present the subject in a complete and orderly fashion, it is our intention to publish a series of articles, of which this one is the first, which will discuss the subject in the following order:

1. The probable demand for yachts in the years immediately following the conclusion of the war.
2. The general specifications of the post-war yachts. Will the majority of them be larger, or smaller, or of about the same size as before?
3. What types of construction may be anticipated? Will they be of wood, metal, plywood, plastics, or a combination of materials?
4. What are the pros and cons of these materials, as developed or employed in war-time boat construction?

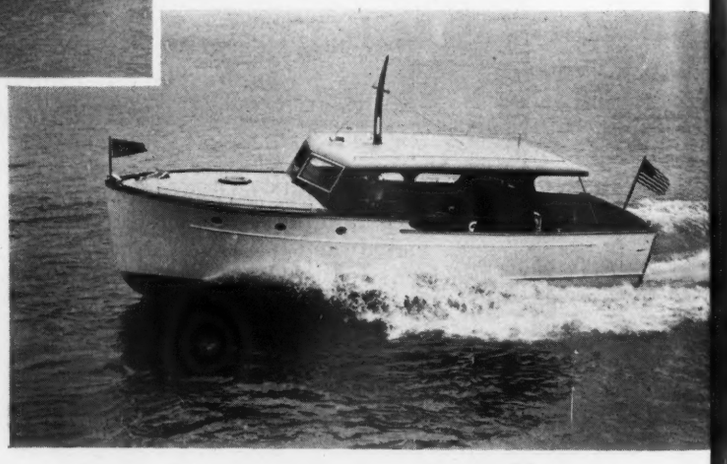
Many believe that the first years of peace will see many fleets of new racing and auxiliary One Design classes of various kinds. Did Lawley's plywood "110" initiate a trend?

5. How will fittings, such as blocks or cleats, or other gear such as rope, ground tackle, winches, controls or heaters, and other equipment, differ from those of previous periods?

6. Will the majority of marine engines be larger or smaller? Will they be gas or Diesel? Will the outboard find greater employment?

7. In conclusion, what general trends seem most pronounced?

These stock cruisers are typical of the last word in pre-war design. They represent the ultimate in the boat builder's craft, and in each one the trend toward modified streamlining is pronounced. What will these same builders be turning out five years hence? Elco, Fachman, Ange Baune Photos



Perhaps the most significant observation in connection with the question of how great a demand there will be for pleasure boats in the first year or two of peace, is that only one of the many individuals approached is of a pessimistic frame of mind. The consensus of all the others points to what may be described as a boom market of substantial proportions — and for new boats. In this connection, it is interesting to note that in a recent survey made by the magazine *Fortune* in which they asked the question: "What one or two things do you plan to buy as soon as times are peaceful again?" a very high percentage of those reporting selected boats as their first choice, and this percentage remained approximately the same in each income bracket, including the lowest. In this poll, pleasure boats are fifth on the preferred list, being preceded only by houses, cars, refrigerators and airplanes.

Naturally enough, each person responding to our query is particularly concerned with the type of boat with which he is most familiar. The builders of sailing and auxiliary craft direct their thinking along lines that pertain to such vessels; builders of power cruisers concentrate their attention on that type; yet all of them are convinced that yachts and yachting are uppermost in the minds of countless thousands, many of whom will be experiencing the joys of pleasure boating for the first time.

There is no doubt in John Alden's mind that there will be great interest in yachting after the war. "I believe," he writes, "that auxiliary cruising yachts which can be easily handled and which have a fair turn of speed will be in great demand. The interest seems to be in boats between 30′ and 45′ over all which can be easily handled by one or two . . . without paid hands. A double cabin sleeping four is required . . . with a comfortable galley . . . and a fair sized motor." Mr. Alden also voices the belief which is shared by many designers and builders, that "many people think that building prices will be at least 50 per cent higher (than before the war)."

Olin Stephens observes that "there seems little doubt that the interest will be in yachts of the smaller sizes, and I can't help but believe that those built in the first year or two after the war will look pretty much like those of pre-war construction. It is highly possible, however, that the builders of motor boats will be in a position to initiate design changes, insofar as outward appearance is concerned, before such changes find their way into the plans of sail and auxiliary vessels. I expect to see greater standardization, not only in fittings, but possibly to the extent of designing basic rigs for boats of various sizes."

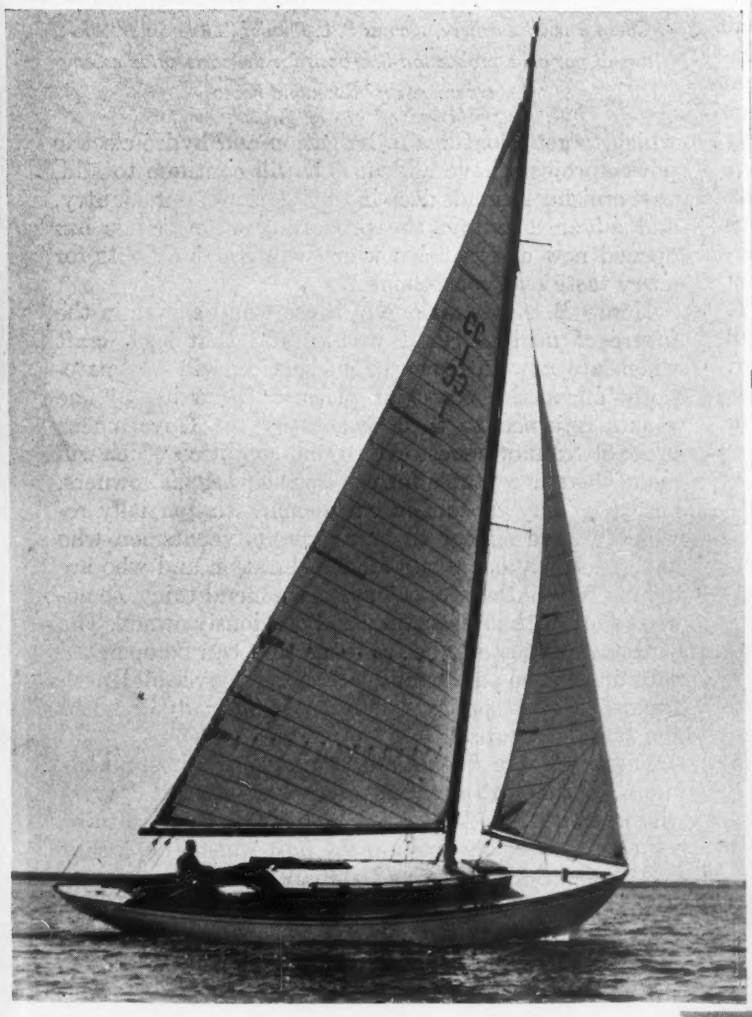
"Every indication points to a great multitude of new yachtsmen in the postwar years," says P. L. Rhodes. "There will be big boats, up to 100′ o.a., to be sure, but I expect to see countless new fleets of small one-design and auxiliary cruising classes. The last few years before the war indicated that what the great majority of people wanted was small auxiliaries large enough for over-night racing. There is every reason to expect that construction costs will be high for the first few years after the war. Undoubtedly, there will be many new developments in the plastic and plywood fields, but don't be led into the belief that there are going to be all manner of construction changes the moment peace is declared. It is logical to expect, however, that dinghies will be the trial horses in

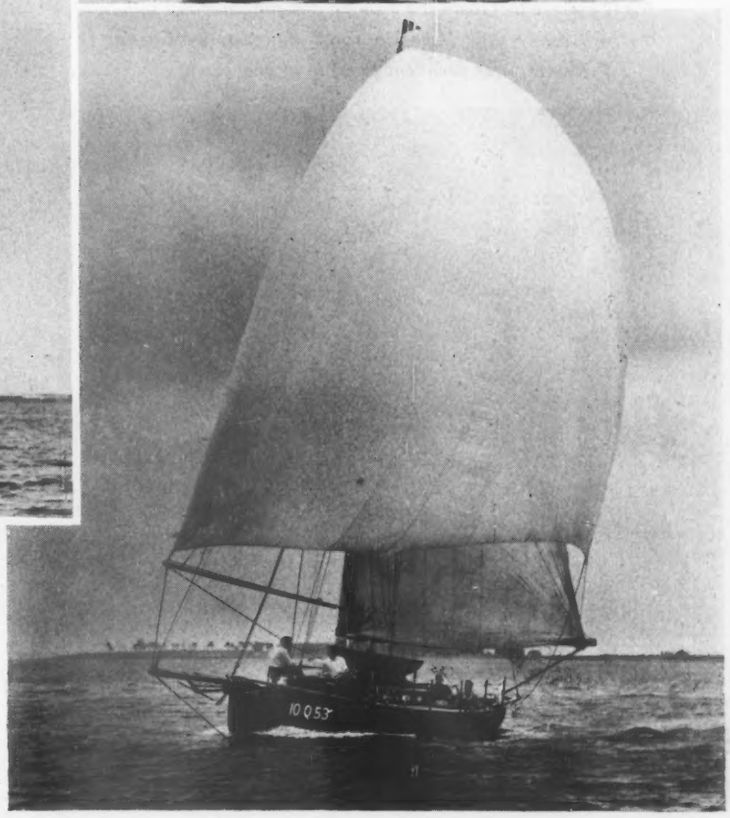
the more outstanding developments of plastics for hull construction. Insofar as development is concerned, a lot will depend on the yachtsman himself. If new ideas, new materials, and new techniques are accepted charitably, then real progress may be anticipated. We may expect a certain amount of standardization in the first boats. Fittings and hardware will undoubtedly be in plastic form, and there is every reason to expect standardized masts — built of aluminum. I am also one of those who anticipate an increasing amount of steel construction, and in boats beginning at about 40′ o.a."

Gates Harpel, of Century Boat Co., makes an interesting case for the stock boat. "Of course, there will be changes in the post-war boat. Early models will be lighter and stronger . . . they will be faster, safer, more efficient and more economical to run. They will be more attractive in styling. But . . . changes won't be as revolutionary as some overly zealous futuristic designers have dreamed. On the contrary, they will be rapid but sane . . . the result of careful engineering and of the use of the best materials available. Advancements in design, construction, performance and appearance will be the result of careful testing and planning . . . reputable builders won't foresake lessons learned in the past to produce a dream boat which gives better performance in the display room than it does in the water."

Who will be the buyers for the nation's new pleasure boat fleet? "I expect to see a boom in yachting," says Winthrop L. Warner, "with a flood of new buyers added to the regular customers. Many of these will come from the Services; men who have had their first taste of boats and the sea under wartime conditions."

William Smyth, of Mystic Shipyard, thinks that "there will undoubtedly be a rush back to the sea, mostly in craft that are immediately available. Sail, I believe, will be more in evidence than it has been for many years, especially in sail boats of moderate size. All of our inquiries these days are for small auxiliaries." And W. J. H. Dyer, one of the foremost designers and builders of small boats, says that "increased volume of inquiries and the interest in small boats point to a large demand."





How will the post-war sailing auxiliary differ from these pre-Pearl Harbor craft? Upper right, "Kidneybean," designed by William Jackson, of Cox & Stevens, was revolutionary in her day. Rosenfeld Photo. Above, will John Alden's new Coastwise Cruisers be molded in one piece? How would Ernest Ratsey's "Golliwog" perform with Nylon sails and an aluminum mast? Rosenfeld Photo

Ralph Wiley is another one who foresees a substantial increase in the popularity of sail. "The established builders of racing sailboats, auxiliary sailing cruisers and motor sailers," he says, "will profit by this trend. The gasoline shortage has opened the eyes of all boat owners to the possibilities of sail and greatly impressed upon our owners of motor sailers the great advantage of auxiliary sails. Above all, we believe — and the letters we are receiving each day confirm this belief — that the new factor which presents the greatest challenge to architects and builders is the multitude of new sailors created by this war who are waiting for that great day when they shall tread their own decks with the rank of owner and master." From almost every source, comes confirmation of the trend (which was growing in momentum before the war) of those who formerly had no use for power, toward installing motors in their craft. "Strange as it may seem," reports Ralph Winslow, "75 per cent of the people I have talked to in my travels are interested in owning an auxiliary sailing cruiser . . . a boat that will really sail." Howard Chapelle echoes the belief that auxiliary craft will be in demand, particularly those which are in the lower price brackets.

One of the most interesting points of view is that expressed by E. L. Goodwin, of Cape Cod Shipbuilding Co. "I believe," he writes, "that our municipalities will wake up to the enormous possibilities of healthful recreation through small boat sailing. I believe and hope that they will follow the example of the City of Boston, where small sailboats can be rented by residents on an hourly basis and sailed under proper supervision. We have municipal golf links, why not municipal harbors where citizens can sail boats?" And that point of view brings up the subject of the thousands of miles of inland waterways which are rapidly becoming a Mecca for sailors of every age and type. "Thousands of men," says R. T. Miller, "have been introduced to every type of small craft, from DEs to PTs, in this essentially maritime war. The large majority will return with the salt of the seas injected in their blood and a desire for something in

Many believe that there is a growing demand for motor sailers — that will really sail. "Cheerio Too," designed by Charles D. Mower, is an excellent example of one which will

Could a small auxiliary, such as P. L. Rhodes "Little Sister," be turned out on a production line basis for the same price as an inexpensive car? Rosenfeld Photo

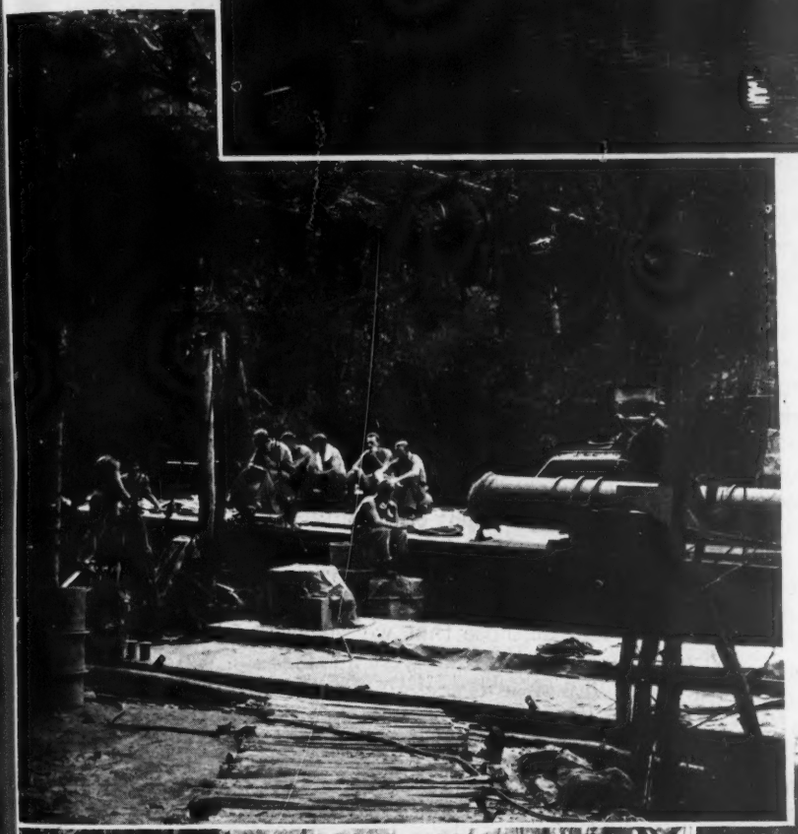
which to get afloat again. Irrigation and hydro-electric power projects have added, and will continue to add, vast cruising grounds deep in the interior of our country, and advancement in the processing of materials has opened new design fields which will provide boats for every taste and pocketbook."

Henry B. Nevins is one of those who believes in the future of medium sized yachts, and that such craft which are now in Government service, will not materially affect the new-boat picture. He writes, "The yachts returned to their owners by the Government probably cannot be restored to that condition which will make them acceptable for use by their original owners, and they may be sold in cheap markets, partially restored. There appear to be numerous yachtsmen who have been without boats for the duration and who are itching to build new ones but, as a general thing, somewhat smaller than those they had previously owned. The expectation seems to be for boats that can be operated with one or two paid hands, averaging in over-all length about 50′. This applies principally to specially designed and built sailboats."

The builders of stock power cruisers are almost unanimous in their observations as to the future. "I am willing to concede that the sale of boats is going to be good after we settle down in the post-war period," says J. S. Lobenthal, of Bruns Kimball. "There will be an exceptional volume of business during the first year after the war," predicts Owens, "and an equal if not greater amount in the years following. We believe that the war has opened the eyes of many people to the pleasures of boating, and we expect the market to expand many times over its pre-war level." A similar attitude is reflected by the engine manufacturers, with the Scripps Company going so far as to say the future market will be the best they have ever contemplated.

There is the evidence — and the conclusions are that

(Continued on page 106)



"GREEN DRAGONS" OF NEW GUINEA

Because of their relatively small size, PTs can be based in the many rivers and inlets that abound in the tropic island groups. Screened by overhanging trees and the camouflage they have added, the PT Squadrons live in comparative ease at the bases they have hewn out of the "gumbo" soil. Boats from such bases participated in the campaign which crumbled the Japanese bastion at Lae.

Top, looking reptilian in its disguise, this Elco PT blends into the jungle background. Upper left, under overhanging camouflage nets, crews get a brief respite. Lower left, drums of fuel are rolled off the ramp of an LCM. Bottom, four abreast to a river "hitching post" in the oily waters of a hidden New Guinea anchorage. Official U. S. Navy Photos

OUR FIFTEEN-TON DAUGHTER

How a Total Wreck Became a Yacht

By IVAN T. SANDERSON

THERE is a certain nobility about a schooner that is possessed by no other type of vessel. When I look at our little schooner and think of the first time I saw her, I cannot quite believe what I see. There she lies, rising and falling to the gentle swell in the harbor, a trim little 50-foot craft with a shining white hull and a bowsprit cocked up at the sky. Her brasswork glitters and twinkles and her varnished deckwork glows with a soft inner warmth. She is covered with ropes like a giant spider's web woven from mast to mast and falling, bell shaped, to the deck. She is beautiful; to me, she is perfect.

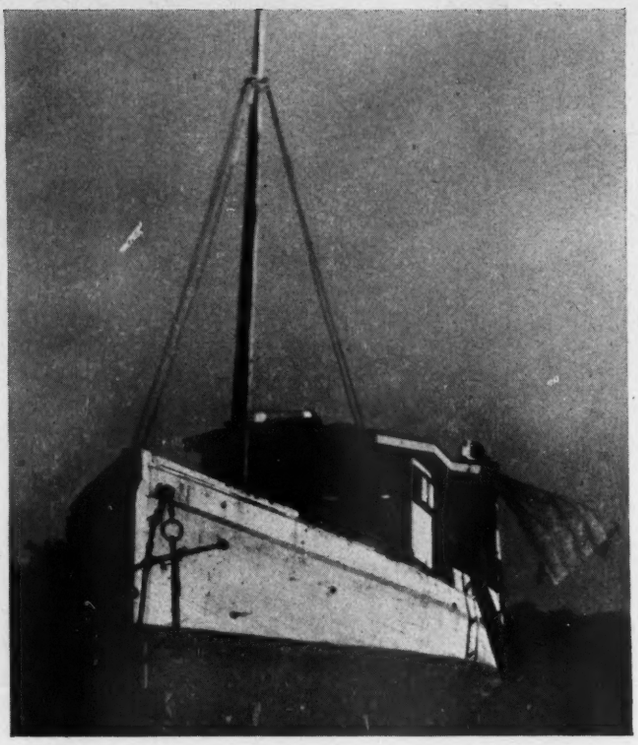
Like all people who own little boats, I like to talk about my floating home and, besides, our boat is more like our daughter because, you see, my wife and I made her.

She was built as a Cayman Island turtling schooner and she has lived a checkered and by no means unblemished career. She has traded and smuggled and even, to my positive knowledge, indulged in piracy on the high seas. Every timber and plank in her has been renewed over and over again; like a hydra, she has assumed many outward forms; like a phoenix, she has suffered many half deaths but, through 70 years of toil and romance, squalor and neglect, hurricanes and the whims of a dozen owners, her gallant soul has clung to her exquisitely designed hull. When we found her, she had almost given up the unequal struggle.

We had always hoped — alas, in vain — to find some excuse for buying a boat but it was not until we had to transport ourselves from a place called Belize, the capital of British Honduras, to the Pearl Lagoons in Nicaragua, that we found something better. There was no way of crossing that bit of the Caribbean except by boat and there were no boats. Here was our excuse. It became imperative to buy a boat of our own.

Belize is a small town but it is a busy port. Little boats, none bigger than the average river ferry, puff and chug in and out almost every hour of the day and night. They crawl along the coast or head out to the open sea with loads of squealing pigs and lowing cattle, their holds crammed full of bananas and their decks loaded with multicolored passengers. Belize is the Caribbean

First we stripped her with the aid of some stout local boys, shovels, axes and sledge hammers



The hulk as we found her. There was a hideous little deck cabin with windows like a trolley car

seaman's corner drugstore, always crowded with loafers and transients, always alive with the bustle of boats.

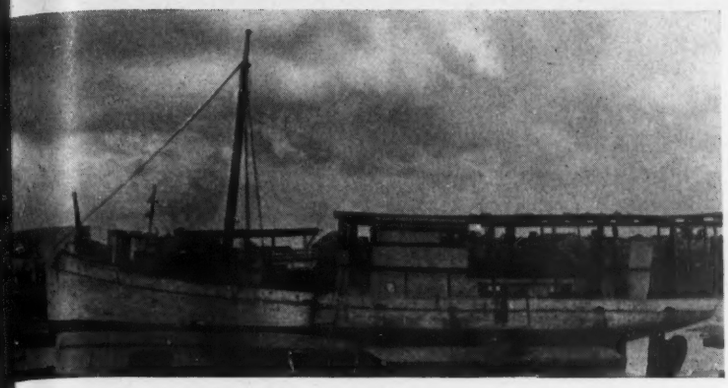
Finding a suitable boat to buy is not as easy as might be supposed. There are so many factors to be considered. We climbed aboard all kinds of oddly shaped craft. We saw boats that were too big and boats that were too small; we saw boats that drew too much water and boats of such shallow draft that one would not risk going to sea in them; we saw motor boats without motors and sailing boats that had motors; we saw boats that would cost a fortune and boats that the owners wanted to give us. About half of those that we saw were rotten and worm-eaten. The other half were not for sale. We spent two weeks, day after day, climbing on and off boats.

Then, one day, when we had given up all hope, a man told us that there was a boat at the bottom of the sea near an island some miles from the port. He described and named her. When I asked people about this boat they all said the same thing: "I thought she'd gone long ago but she used to be a fine little sailer." So we persuaded the man to collect lots of empty 50-gallon gasoline drums and to hire a motor towboat and we sent him off to the island. He sank the drums, lashed them to the boat, pumped air into them and raised her. There was nothing wrong with her. She had simply filled with rain water and sunk, so they pumped her dry and towed her in. The man called us to come and have a look at her.

When I first saw her, I don't think I could have been more stunned if the man had hit me over the head with a marline spike. She was vast and she was terrible in every way.

Her paintless sides looked dry and brittle. There was grass growing on deck and she had a horrible flat roof extending from the stem to far over the stern with a beastly little funnel sticking up through the middle. There was a hideous little deck cabin with windows like a trolley car. A short mast stuck upright on the foredeck like a candle in a wedding cake.

A sailer, indeed! Could this monstrosity, something



The hulk ready for demolition. We cleaned her off right down to the deck. It was some job

between a river steamer and a floating bungalow, have ever been graced with the beauty of white canvas? Despite all I had been told, I could not believe it.

She was hauled up on a slip between some barges. We climbed over a barge and took another look — and then I looked again more closely and was amazed. Through the grime and the camouflage of extraordinary deckwork and superstructure, I clearly saw something that was beautiful. Sweeping away the monstrosities and the mess, there, beneath, lay a seaman's dream, a schooner hull of perfect design and proportions. There was no mistaking that graceful sheer and the slender bow nor, when one looked harder, that unmistakable stern.

So we bought her for $300 — which was slightly absurd however you looked at it: either an outrageous sum for a derelict hulk or a dream song for a 15-ton schooner-rigged yacht. The owner was hundreds of miles away so we sent him an offer by cable and in reply he sent back the one word "Yes." Two days later, we stood on the grass-covered deck and contemplated. We had bought our boat; now we must make her go. To do this, took three months; the three happiest months of our lives.

We set to work next day with two stout local boys, some buckets and shovels, two axes, pinchbars and sledge hammers. We sent the boys below with the buckets and shovels because within this poor boat was the most depressing sight I have ever seen in anything that is supposed to float. Great hunks of rusted engine lay scattered about, half buried in a goo of black Diesel oil and stinking mangrove mud two to three feet deep. Tangles of rotten rope and banks of seaweed were piled against the bulkheads. For days they shovelled and scraped and boiled buckets of soda and white sand and scrubbed and scrubbed.

We went to work on the deck work, prying it apart, drawing all the multitudinous nails and stacking the lumber carefully for, despite the looks of the boat, every timber and plank was sound and as good as new. We took everything to pieces except the hull itself. We pulled out the ugly little mast with the help of the winch and a tripod of borrowed scantlings; we dismantled the deckhouse and an outrageous galley and latrine built of matchboard and stuck out over the stern. We sawed the flat roof into seven-foot sections and lifted these off whole. We cut out the whole of the center of the deck. We scraped the hull and puttied her seams. We scraped and planed the deck and found it sound and fresh underneath.

The second-hand engine is installed. It maintained an insatiable thirst or hunger for nuts, bolts, screws, etc.

When we had finished, she looked like a 50-foot dinghy stripped of everything but the winch. When she was thoroughly cleaned and scrubbed, we piled all the lumber back into her gaping hold and moved her to the yard of a shipwright.

I had never drawn a blue print of a ship nor, for that matter, of anything else but, when you own a boat of your own, you soon discover that you can do lots of things that you never suspected. For hours, we crawled about that hull with a steel tape and a pair of crude calipers, measuring this way and that and entering figures in a grimy notebook. Then we went home and laid out three large sheets of clean white paper. Late into the night, with coffee cups at my elbow, I wrestled with dividers and compasses and triangles and sharp pencils and unprintable language and behold, in the morning, our boat, in plan, elevation and lots of sections. What is more, to my joy and infinite surprise, the shipwright said he understood them perfectly and he proved it by immediately putting two men to work. In due course, they built up a "longhouse" or sunken deckhouse, over the cutout in the deck exactly as I had pictured it in my mind's eye.

While the shipwright was doing this, we were busy on other matters.

Have you ever considered what even a small boat needs to make it go? I never had. It seems easy enough at first. You need masts and sails and, perhaps, an engine. You know vaguely that you would like a galley and bunks and lockers for your comfort and, of course, there are some things like anchors and fenders and a compass and charts and a dinghy to get ashore in. One tends to forget that a simple boat has nothing beside her hull and deck and, perhaps, a rudder, to begin with. We retired to a low tavern and, over glasses of beer, we started to compose a list.

Even two of the veriest landlubbers know that masts and sails require booms and gaffs and rigging wire and ropes of every kind. They may forget at first blocks and hanks and eyes and thimbles and cleats and even canvas. It is easy to see that an anchor needs chain and a winch and chain boxes and a spare anchor and a cable. And then the boat wants skylights, which means glass and

skylight covers, and sail covers and awnings because of the tropical sun which opens up decks. And a rudder's no good without a wheel which itself needs a little house, and then there are portlights and ventilators and flags and all kinds of things for the dinghy. Then you can't live in a hollow cave of a hull. You must have bunks and lockers and something to wash in and a galley and a stove and, oh heavens! water tanks and kerosene tanks for the stove and alcohol tanks to light the stove, and lights and curtains and bunk covers and a table and something to sit on; in fact, everything that one would need for a small apartment. And then there is the engine.

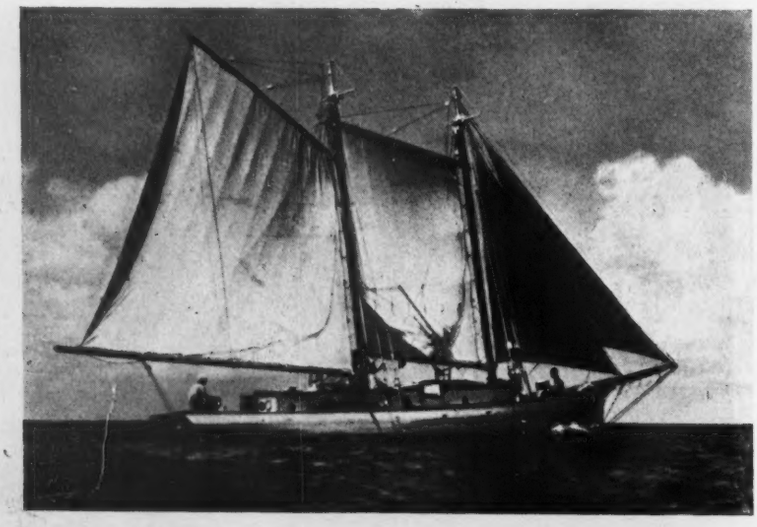
When we reached the sixteenth sheet of foolscap in composing our list, we shifted to whisky chasers. The list tentatively ended at the nineteenth page. It was headed by an item specified as: "One gasoline engine, less than six feet in over all length, capable of five knots. Cheap." We left the tavern and set out into the town.

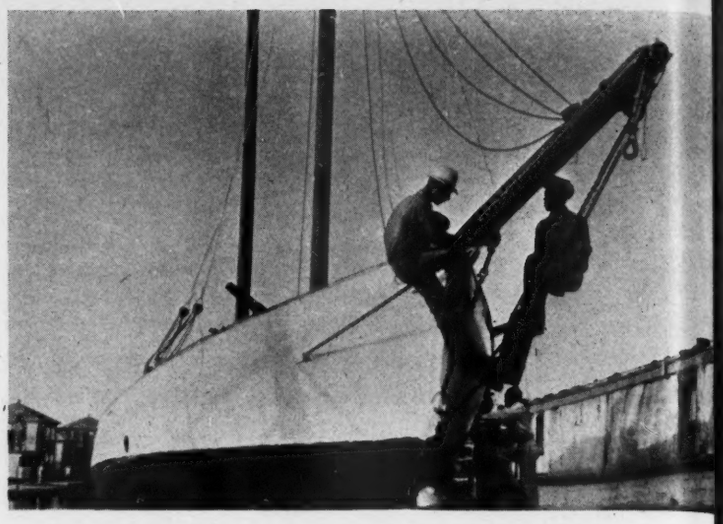
Now, for years Belize has been a graveyard for boats. Yachts come from America and the climate is so enticing that their owners stay on and on until they go bankrupt. Enthusiastic people set out to transport bananas — and the fruit rots in a storm and they, too, go bankrupt. Little passenger boats run onto reefs or burst their tired old engines and are towed into the harbor and abandoned. People buy boats to prevent other people from using them and park them in the rivers. All these boats are left lying about until they finally go to pieces. Shipwrights buy pieces, owners sell pieces, thieves steal pieces and little boys carry off pieces. All the pieces are passed around from hand to hand until they end up in some backyard. Perhaps that is why Belize is the only place in the world where we could have done what we did.

We found, in a shed, an engine painted gray and looking quite complete and tidy. We said we would buy it if we could take it to pieces first. The owner immediately halved his price. We went off to lunch and repeated our offer in the afternoon. The owner hesitated but again reduced his price so we took delivery of the engine on a $100 down payment.

Next, we found an engineer and some tools and hired a little shed on a mudflat for 50 cents a week. We put him there with the engine and a small black boy to help. In two days, he reported that only 33 parts were missing, so we paid the rest of the price and went to work in the local garages and junk heaps. In a week, we had 31 pieces of the puzzle; meanwhile, the engineer had taken the rest of the engine completely apart.

Our Fifteen-ton Daughter sails again at last





Rigging the bowsprit was one of the clean jobs

From then on until we sailed away that engineer maintained an insatiable thirst or hunger for nuts and bolts, screws, washers, pipes, elbows, gaskets, nozzles, tubing, wire and rods that would defy belief. We finally had to get him a little engine to make the big one go. But we were busy, too.

We found two perfect masts of selected Oregon pine, lying forgotten in tall grass in a field along with a bowsprit, two gaffs and a fore boom, all of exactly the size and weight that we needed. After sundry swift maneuvers, we bought the lot for $40 from a sensible man who had only half the right to sell them. We sneaked them out of the field while our stooges got the other half owner drunk in a rum shop at the opposite side of town.

A rotting hulk had a fine propeller of just the dimensions we required. The owner was stubborn so we bought it from the caretaker who assured us that he could get his wages only by selling off the boat in pieces. He had been doing it for years and, as he had stripped the copper sheathing from her bottom in some ingenious manner, he was soon going to sink and be without a home or a job.

There are no ship chandlers in Belize. The good general stores do not cater to shipowners specifically. Our skylights needed plate glass and there was none in town. However, we found a pile of shattered glass from a smashed shop window and we soon learned how to cut thick glass satisfactorily.

We shall not forget the port lights; every time I look at them my Scotch blood nearly freezes. They are made of brass and are big enough to climb through. They are fit for a liner and are catalogued at $175 each. A friend remembered that a sub-chaser had been abandoned years before on a mangrove island off the coast. He also remembered that she had had several fine portlights and he affirmed he had seen the glass from these in a junk pile. We went and looked and he was right. Luckily, we spotted the brass base plates at the back of a garage. We bought these for a dollar apiece and captured the glasses for 50 cents each. Some time later, the brass rings that held the glass, with the hinges (which had been cut off the base plates with a hacksaw), were unearthed from some rubbish under another man's house. We bought these for a dollar each and, after some amateurish brazing and a lot of filing, we had portlights valued at $175 for $2.50.

It may seem odd that a boat, which is a thing made to float, must be filled with tons of iron or lead before she is seaworthy. It seems odd but it is a fact that ballast is one of the most important things in a boat. Our boat had

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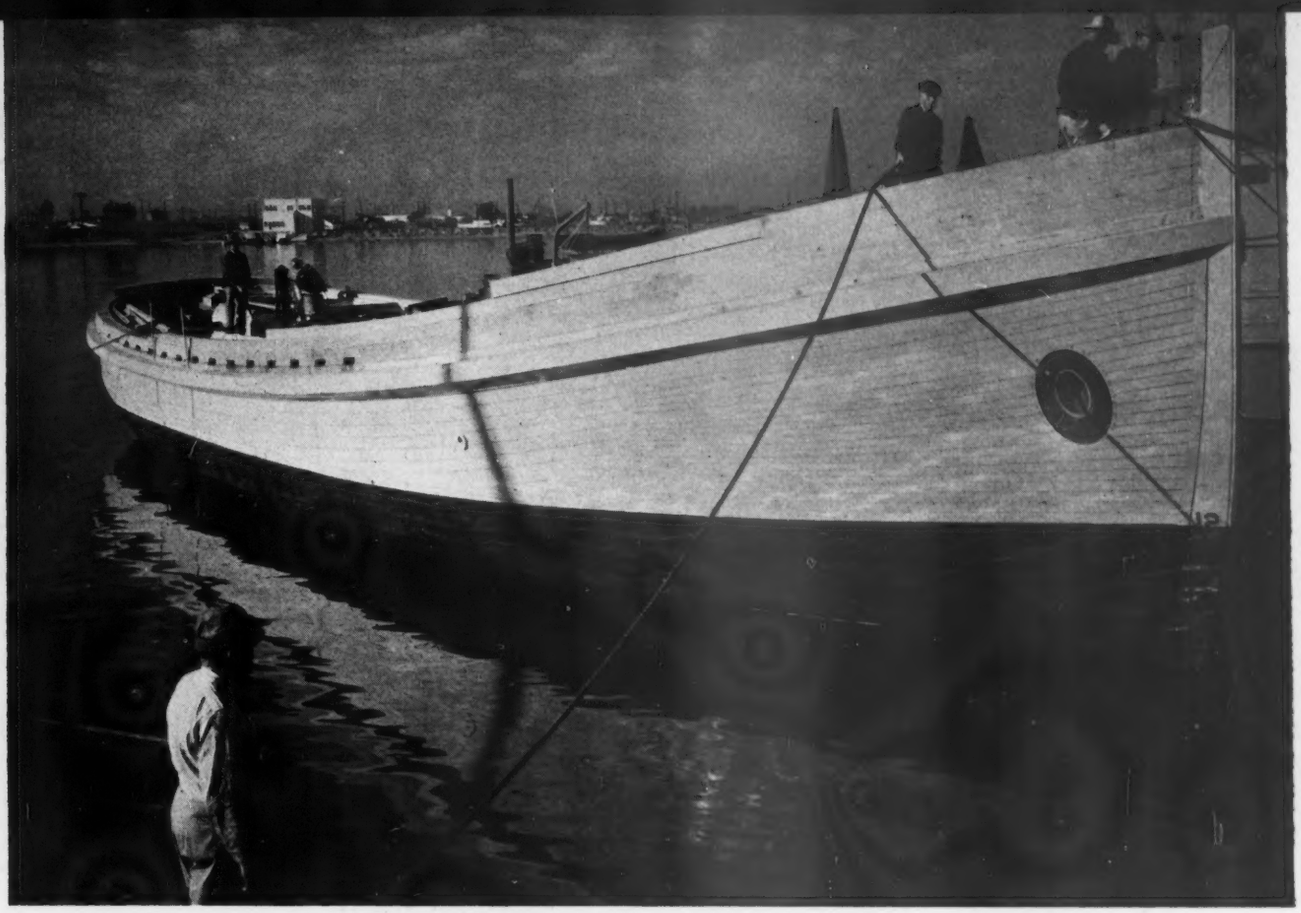


The hull of an Army 96-foot cargo and passenger vessel slides off the ways at the yard of The Peyton Co. The "Army's Navy" is one of increasing size and variety, and is to be found in every theater of operations

THE BUILDING OF A FLEET

In a Period of Less than Three Years, American Builders and Manufacturers Have Combined to Create the Greatest Fleet of Small Warcraft in the Nation's History

Washington. "Invasion craft have been put ahead of everything else in the nation's arsenal with the granting of an overriding priority, giving them the right of way over planes, high-octane gasoline and all other 'urgency' production programs. A vast number of prime contractors will be turning out landing craft and, with their subcontractors, the total number of manufacturing companies involved in the vast drive will be about 20,000. The number of self-propelled landing barges, amphibious 'ducks', tank-landing vessels and other invasion craft was not divulged, but the program was understood to exceed the 'big push' on various types of landing and amphibious craft last fall and winter that preceded the Mediterranean invasions.

"A formal report by the House Naval Affairs Committee on a fleet expansion bill proposing the expenditure of $5,000,000,000 underscores the Navy's preparations for intensified amphibious warfare and invasions during and beyond 1944. The authorization will call for acquisition of 2,500,000 tons of auxiliary and other types of vessels . . . in addition to 1,000,000 tons of landing craft. This shift from construction of defensive naval vessels . . . in favor of primarily offensive vessels, such as landing craft and amphibious vessels, was interpreted as official acknowledgment that an important turning point in the war had been reached."

In this terse yet comprehensive statement is what might be described as the official barometric reading of the amount of naval warcraft construction which, in all probability, may be anticipated as being on the building schedule for 1944.

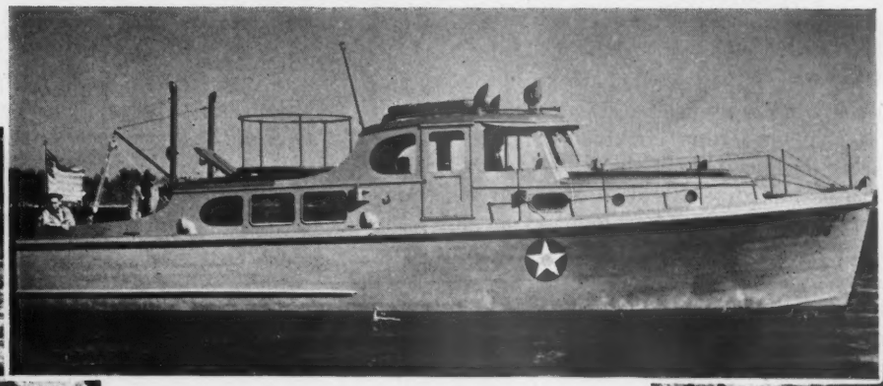
But this is only half of the story. There remains a vast amount of Navy small boat contracts of nearly all types yet to be completed and, in many instances, not even the next twelve months will see their conclusion. There is, in addition to the greatly accelerated building program of amphibious craft, a wide variety of miscellaneous (Navy, Coast Guard and Maritime Commission) small craft, which must come from boat yards rather than the large ship builders. And last, but far from least, is the small boat building program of the various Army corps which, at the present writing, gives every indication of being one of the most varied and important items on the 1944 production calendar of America's boat builders, engine makers and equipment manufacturers.

When analyzed objectively, the situation today is pretty much what every astute observer had anticipated it would be. It was in 1940, when the rumblings both in Europe and in the Far East indicated that it was only a matter of time before the lid would blow off, that the Navy initiated its small boat building program. Starting at a slow gallop, it soon accelerated to a dizzy

TWO NEW ADDITIONS TO THE FLEET

Above, "Maj. Gen. C. L. Tinker", first of the Dair Long & Associates designed 85-foot crash boats for the newly formed Emergency Rescue Branch of the A.A.F. One of a fleet being built by Dooley's Basin & Dry Dock Co. and other yards, they are a larger version of the Navy's 63' rescue craft. Main engines are Packard, cruising are Chrysler.

Below, PCS 1423, recently launched by the Burger Boat Co., and among the first of a new type of small warcraft. These submarine chasers reveal a family resemblance to the YMS motor mine sweeper, and are a modification of that design by Cox & Stevens. 136' o.a., they are fitted with dual-purpose guns in addition to smaller A.A.'s



The rescue of planes and pilots shot down at sea is a vital and increasingly important service carried on by both the Army and the Navy. The craft employed are specially designed for rescue duties and are of a wide range of types and sizes. Above, the 42-foot Army crash boat is a type built by Owens, Chris-Craft, Dodge and others. Left, an Army 104-footer from the yard of Stephens Brothers. Similar craft which they have constructed are powered by Packard, Hall-Scott and Kermath engines. Right, a Navy 63-footer built by Stephens Brothers and powered by Hall-Scott. These speedy vessels have been constructed by numerous yards

and somewhat breath-taking speed. YMSs, AMcs, SCs, PCs, PTs and all the numerous types were scheduled for construction at a rapidly increasing rate, while engine builders and equipment manufacturers were being called upon to accomplish production miracles. The Army entered the marine field a little more cautiously — and advisedly so. They knew where and how they hoped the war might be fought, but there were no practical means of trying to outguess the turn of events. As a result, it was not until late in 1941 that their small boat program began to make itself really known. Since it started later, there is today every reason to expect that it will last longer. Moreover, since Army craft are fundamentally logistic rather than offensive or defensive vessels, their functions are not basically altered by the rapid turn of military events.

But irrespective of the conduct or the course of the war on its many fronts, the nation's marine industry is today facing another year in which it will be called upon to continue to add its productive talents to the cause of ultimate victory. As Rear Admiral Cochrane, in behalf of the Navy, and Brigadier General John M. Franklin, in speaking for the Army, have stated elsewhere in this issue, the contribution to the war effort which all of those who have been, are and will be creating this mammoth small boat fleet, is incalculable. Significant is the statement of Admiral Cochrane that "one of the most impressive and most satisfying statistics is the reduction in man-hours required to turn out these craft."

Insofar as the smaller vessels are concerned (and exclusive of amphibious vessels), the Navy's small boat building program is centered around a carry-over of the 1943 YMS schedule and four other types: the 63′ Miami-type aircraft rescue boat, the 24′ plane personnel boat (both Mark I and Mark II models), the 33′ plane rearming boat and the 45′ picket boat. All of these craft will be built throughout 1944 by a highly diversified group of yards. At the present writing, no new types of wooden vessels have been announced, nor is there any present indication that there will be replacement orders for either SCs or PCs. Interesting enough, production on one of the Navy's most famous types, the 50′ motor launch, is at a complete standstill for the reason that the larger types of combat craft no longer carry them aboard.

The emphasis on amphibious and landing craft, particularly the 36′ and 50′ models, has its origin in the fact that they have proven to be highly successful, not only for the purposes for which they were designed but for a wide variety of other functions as well. To say that they are officially regarded as "expendable," is but another way of indicating what the Navy's future requirements may be. The House Naval Affairs Committee, in speaking of the new fleet expansion bill, pointedly states that "it will be noted that the majority of auxiliary vessels and landing craft . . . to be obtained through the enactment of this bill are for use in amphibious warfare. This type of warfare is greatly increasing in extent and will result, in all probability, *in considerable losses in these types of ships.*" At the present

Both the Army and the Navy maintain a vast fleet of tugs. This Army 123-footer was built by the Jakobson Shipyard
Rosenfeld Photo

time, no new models are anticipated, although there will undoubtedly be numerous constructional variations within existing designs. One of the Navy's principal objectives is to standardize the structural variations introduced into landing craft of an identical type by the different builders, as they feel that maximum production can be achieved only by so doing.

The climatic conditions of the South Pacific area have been a major factor in bringing about the employment of steel rather than wood in many of the Army and Navy small boat types destined for that theatre of operations. But great progress has been made by both Services in the development of preservatives which, if proven as successful as anticipated, will do much to increase the longevity and serviceability of wooden hulls of all kinds. The Navy has also done much experimenting with various processes of laminations, and this technique of construction gives every indication of revolutionizing the design and construction of wooden craft. Already, stems, keels and frames for various types of small craft have been ordered, and the practice of using laminated skegs on the smaller types of landing craft has proven completely successful.

What is perhaps the most accurate official estimate of future Naval construction was made by Secretary Knox in a recent press conference. "We are doing everything we can to keep up production," he said, " . . . the Navy is still in the midst of production. It will have more ships added to the Fleet next year than we had this year . . . so that ours is an increasing scale of expenditures rather than a decreasing one. Added to that, is the fact that the naval war is chiefly in the Pacific, and the war in the Pacific is just at its beginning, in contrast to the war in Europe which has now come towards — what we hope — its finish. Hence, our expenditures are bound to go up."

A bird's-eye view of the Army's 1944 building program reveals the following types of vessels:

Barges, Self Propelled: 125′ Diesel Harbor; 105′ Cargo Tank Barge; 180′ Tanker; 155′ Cable Repair.

Freight & Passenger, Large: 140′ Cargo — Passenger; 168′ Supply Vessel; 176′ Supply Vessel; 148′ Cargo Passenger.

Freight & Passenger, Small: 96′ Harbor Boat, Logan Type.

Launches, "J" Class: 42′ Boat Command; 45′ Patrol Boat; 38′ Picket Boat; 36′ Shallow Draft Launch.

Launches, "Navy" Type: 40′ Motor Launch; 50′ Navy Type Motor Launch.

Launches, Outboard: 15′ Skiff.

Propulsion Unit Barge: Marine Tractor.

Propulsion Unit: Outboard.

Rescue Boat: 36′ Shallow Draft; 45′ Rescue Boat; 85′ A. C. Rescue Boat; 100′ Rescue Boat A. C. Rev'd.; 27′ Rescue Boat, Shallow Draft.

Swamp Gliders: 16′ Shallow Draft Rescue Boat.

Towboats: 26′ Mine Yawl.

Tugboats, Large: 123′ Oceangoing Tug; 149′ Steam Tug; 113′ Steel Tug; 126′ Twin Screw Tug; 143′ Diesel Electric Tug, Steel.

Tugboat, Medium: 86′ Tug, Steel; 72′ Tug.

Tugboats, Small: 45′ Steel, Motor Tender; 46′ Towboat; 36′ Eureka, S. D. T.

Cargo Barges, Non-Propelled: 203′ Cargo Barge.

Barges, Cargo, Medium: 110′ Cargo Barge; 130′ Lighter Barge; 104′ Refrigerator Barge, Steel; 104′ Combination Barge, Steel.

Barges, Cargo, Small: 45′ Barge, Steel; 60′ Barge, Wood.

Cranes, Floating, Large: 140′ 100-ton Revolving Crane Barge; 60-ton Crane, Medium; 61′ 30-ton Derrick Barge, Steel, Small; 110′ Whirley Crane Barge; 90′ 15-ton Crane Barge, Steel.

The restrictions imposed by security regulations prohibits any detailed analysis of 1943 warcraft production data, but the following summary of certain representative builders, engine and equipment manufacturers gives a picture of the marine industry's production achievements during the past twelve months:

BUILDERS:

The Anchorage: 9′ Dyer Dhow.

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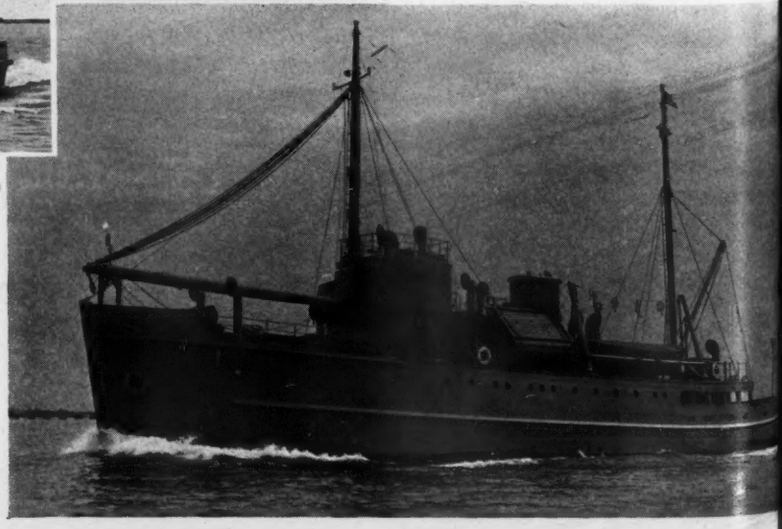
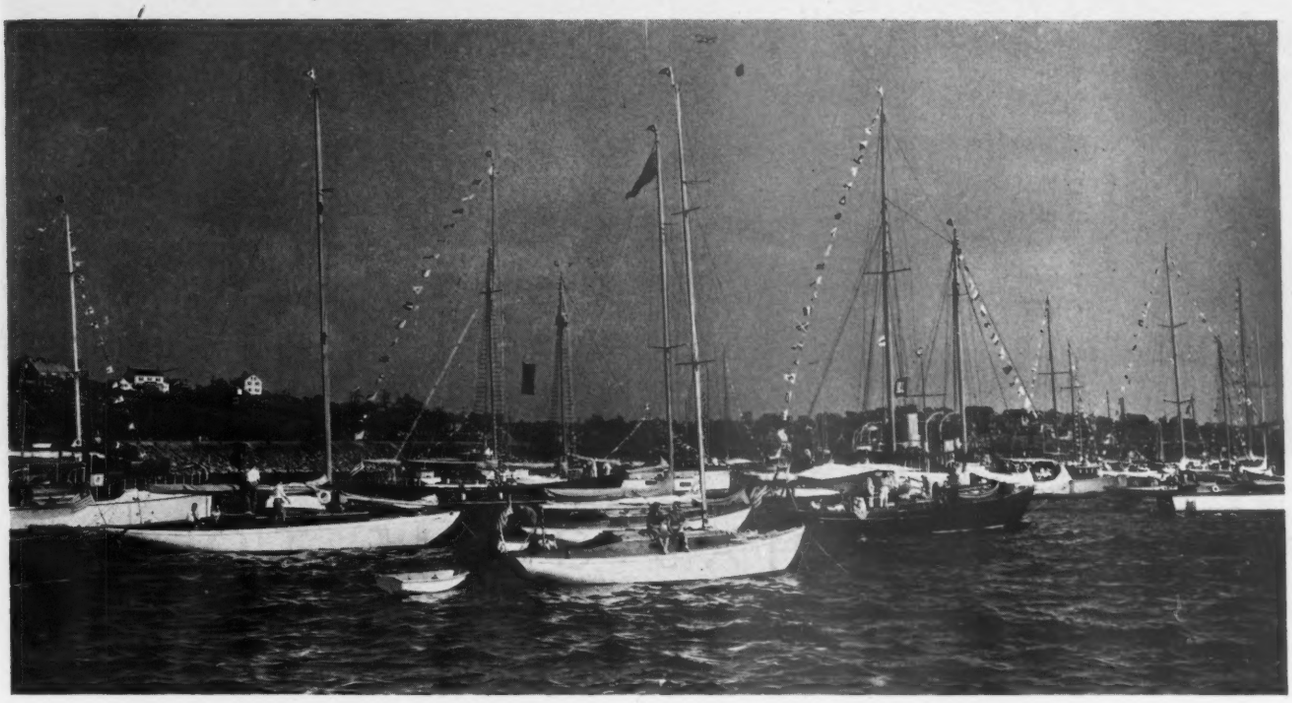


Never in history have the Armed Forces been so dependent on floating equipment as they are in this war. Above, one of the 46-foot MTL tugs constructed for the Army by Henry R. Hinckley & Co. Upper right, a 36-foot LCV landing boat built by Owens. The 140-foot wooden freight and passenger vessels are among the most interesting in the Army's fleet. This one is from the yard of the Cambridge Shipbuilders



Pick out any yacht in this scene of some years ago, get in touch with your yacht broker and, in nine cases out of ten, she will cost as much or more today as the day she was launched

THE WORLD'S BEST INVESTMENT

Buying a Good Boat Is Sound Financially

By RUTH BRINDZE

OBVIOUSLY a boat is the best investment in the world since she pays dividends in something rarer than cash. Even if this real though intangible value is discounted and boats are considered from the strictly practical bookkeeping angle, they stand up equally well. As an investment, a good small boat is as sound as good stocks, bonds, and most real estate.

Right now the boat market is booming and the sky, or pretty nearly, is the ceiling for everything from dinghies upwards. This may be news to those whose wartime jobs keep them away from pleasure boating. There has been so much talk of restrictions, including the ban on power boating in certain areas, that you had to see to believe the liveliness of the past season. Of course, the turnout for races was not what it used to be but there was always enough competition, while cruising men discovered in nearby harbors as green havens as those farther off. Even power boat owners, who spent the greater part of the season riding at their home moorings, had a good enough time of it. What the situation will be in 1944 is anyone's guess; the wise boys are betting that it will be good, and they are buying accordingly.

No one who bases predictions on historical precedents could have forecast the present state of the market. During the first World War, yachting hit a low and so did the boat market. But those were still the days of big yachts, which required big crews, as large or larger than the owner's party, and, because of various shortages and restrictions, many boats were laid up for the duration. Things are different now for, in the period between wars, small boats have come into their own and the rig and ease of operation of these have been so simplified that even men turned down by Uncle Sam for one defect or another can sail them single-handed. These men, and other stay-at-homes, want boats just as they always have; and not enough boats are available. In 1943, demand, in many parts of the country, exceeded supply, and prices rose accordingly.

The first boom was in power boats for Coast Guard Reserve duty. The demand for auxiliaries came later but it is rapidly gathering momentum and, as things now stand, the buying wave is just beginning to roll. The plain facts are that people want boats, that the national income is up, and that no new pleasure boats are being turned out. The inevitable result, my friends, is the inflation of values.

An example in point is a recent sale of an auxiliary of just under 40 feet length over all. According to fairly well authenticated rumor, she was sold for approximately $1000 more than it cost to build her five years ago. The boat was kept in excellent condition and has a large assortment of sails. But neither of these factors, at another time, would have been enough to have justified the price she is said to have brought.

Since there always have been, and probably always will be, skippers who fall in love with some beauty or other and are ready to pay what it costs to get her, perhaps this one sale should be written off as non-typical. The price for which auxiliaries built to class specifications are selling may provide a better line on the state of the market. During normal times, the depreciation

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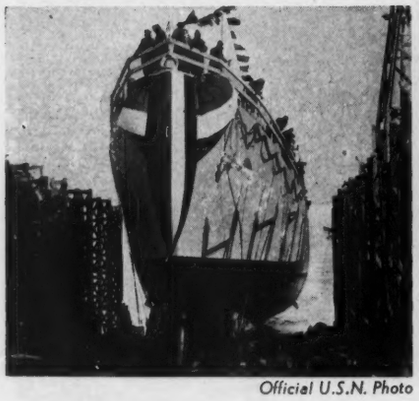
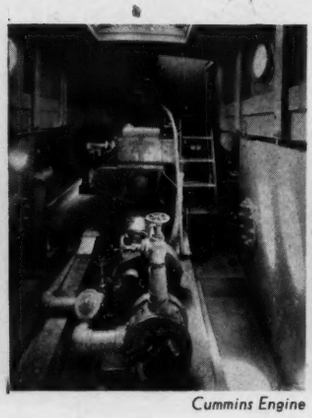
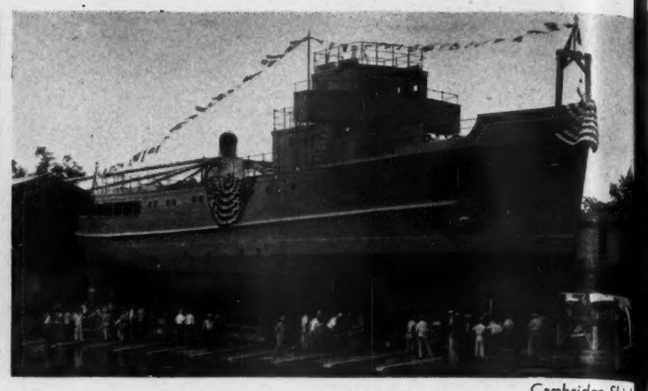


Official U.S.N. Photo



Cummins Engine



Cambridge Shipb

THE ARMY HAS GONE TO SEA

By BRIGADIER GENERAL JOHN M. FRANKLIN, T.C.
Assistant Chief of Transportation, United States Army

SOME months ago, YACHTING published a detailed account of the Army's varied floating equipment under the title "The Army's Navy." That description was as complete as the interests of security would then permit, and it gave a rather comprehensive picture of what has often been described as the world's largest "small boat navy." I might add that I am advisedly using the term "small boat," for, although the bulk of the Army's fleet consists of vessels under 200′ o.a., that service does maintain transports, minecraft and other types of vessels of substantial proportions.

The scope and magnitude of the water transportation requirements for a huge Army engaged in far-flung global war is probably beyond the conception of those not directly associated with this titanic assignment. It is probably the popular conception that food, munitions, planes, tanks, trucks and the multitudinous other supplies required are simply loaded on ships here in the United States and delivered to troops in various places; but there is a lot more to it than this. Troops are stationed and are engaged in combat at many pinpricks on a map where no docks or port facilities exist; in fact, right now troops are being supplied in many places where there is nothing more than a barren beach or an uncharted stream winding off into the interior. It is in such cases that hundreds of thousands of tons of supplies must be taken to their ultimate destination in the small craft which are the products of the craftsmanship of the legion of American ship and yacht yards.

Equally important are the scores of small Army warcraft which, although not combat vessels in the strict sense of the term, fulfill a wide variety of auxiliary missions upon which the tide of battle so often depends. No mention of Army vessels would be complete without mention of our tugboat and barge fleet. These essential workhorses of the sea have done a job which, a year ago, would have been labelled as "impossible," and too much credit cannot be given their high operational efficiency.

At the very outset of the war, the War Department realized how tremendous the demand for floating equipment would be, and proceeded at once on a gigantic program of procurement and construction. All of the large shipyards of the country were operating to their maximum capacities in the building of large vessels for the Navy and the War Shipping Administration. It soon became apparent that the only way that the Army's demand for small craft could be met was through marshalling the building facilities of those small boat plants which had previously been concerned with the construction of pleasure, fishing and small commercial vessels.

The swift organization and adaptation of these small boat yards for war work, and the coöperation of both management and labor alike in rapidly developing the production of the various types of craft required are a noteworthy accomplishment. Much credit is also due these yards for their invaluable aid in designing various types of craft. But perhaps the most gratifying accomplishment of all is the speed-up in production which has been achieved. An examination of the building records in 1943 indicates that Army vessels are today being built in 18 per cent less time than in any previous period.

So, the Army has truly "gone to sea." Small craft of every type and description have been and are being acquired and constructed. The building program for the coming year embraces, as it did in 1943, almost every type of vessel, from small rowboats and motor launches to large ocean-going vessels, and includes tugs and barges of all sizes, tankers and tank barges, various types of fishing boats, motor boats, yachts and cabin cruisers, rescue vessels, sea tractors and outboard motors of every size. The 1943 construction appropriation for the Army's small boat program was in excess of $200,000,000, and represented an increase of approximately 25 per cent over the 1942 budget. The 1944 budget will represent another increase, which is indicative of the importance the Army places on small craft in successfully waging this essentially amphibious war.

The need for small craft is still vital and it is of the utmost importance that production be not permitted to lag. Thus, the help and coöperation of every yard engaged in Army construction in meeting the needs of our armed forces is an outstanding contribution to the nation's war effort. Every builder and equipment manufacturer so employed may feel with pride that he has participated in no small degree in supplying our soldiers in every theatre of combat.

Stephens Bros.

South Coast Co. (Hitchcock)

North American Shipbuilding Co.

BUILDING FOR VICTORY

By E. L. COCHRANE,

Rear Admiral, USN. Chief, Bureau of Ships, United States Navy

THE YEAR 1943 has been one of phenomenal records achieved in naval construction. The impossible has been and is being accomplished by American ship and boat builders; an achievement made possible by the devotion to duty of the personnel of these many yards, and by the all-out coöperation being given the builders by American industry as a whole. The combined efforts of individuals and of industry have been inspired by the realization that a United Nations' victory depends, to a substantial degree, upon their ability to provide the Navy with the finest in small warcraft. That their goal has been largely achieved is now a matter of record.

A year ago, the course of the war was uncertain, and we could but hope that the countless types of small craft which we had designed for a wide range of duties were the right ones for the job. The pattern of the war has developed since then and substantiated the decisions made earlier on these designs. Developments to meet changing war conditions have been necessary; but each of the types has proved, under active service conditions, its basic suitability not only for its intended duty but in many cases for other duties of importance. The pages of YACHTING have carried from month to month the descriptions and combat records of our highly diversified "small boat navy." The many types of patrol and escort craft have achieved an enviable record; and they are now serving in every zone of combat in every theatre of the war. Although the submarine danger has been greatly reduced, and the need for inshore patrol vessels has diminished, these same vessels are finding a wide range of assignments in the Atlantic, the Pacific and the Mediterranean. Minesweepers and related vessels always have a job to do wherever they may be; and few are the action photographs that come in which do not show busy YMSs and AMcs hard at their dangerous work.

The spectacular activities of the PTs in the South Pacific are now history. Their performance record is tangible proof of the tremendous advances that have been made in motor boat construction and in the very essence of these boats — the engines. And, speaking of combat records, it would be difficult to imagine what the strategy of this war would have been without the employment of the many types of small landing craft used in our varied amphibious operations. They have suffered the hardest type of treatment under the most wearing conditions, yet in no instance have they failed to gain a beachhead when ordered to this heroic task. To the record must also be added a sincere commendation for the "unsung heroes" of every navy, the small auxiliaries, which range from rescue vessels to tugs. Their unromantic and seemingly commonplace duties make possible the more momentous actions which follow.

The production records achieved and the technological advances which have been made by the engine and equipment manufacturers are in many ways remarkable. What is an actuality today would have been described as an impossibility but a very few years ago.

How, one may ask, have the nation's small boat builders — who up until Pearl Harbor had been principally concerned with the construction of yachts and small commercial vessels — been able quickly and efficiently to convert their facilities from the somewhat leisurely pace of peacetime activities to the rigid demands of wartime production schedules? The answer, I believe, is that the experience gained, and the techniques employed, through years of small boat building have enabled them to put this "know how" to work and thereby to achieve a production miracle.

One of the most impressive and most satisfying statistics as regards our small ship program is the reduction in man-hours required to turn out a craft of a given class; although the vessels themselves are increasingly complicated. This has been brought about by various causes but the primary one is the effort, enthusiasm and "will to win" of the workers themselves. The following examples are illustrative of the improvements which have been realized: Reduction in man hours to construct — Patrol and Escort Craft, 23 per cent; Minesweepers, 24 per cent; Auxiliaries, 25 per cent; Landing Craft, 33 per cent; Motor Torpedo Boats, 44 per cent.

The efforts made and the results accomplished by the small craft builders and the manufacturers of the propelling machinery and the equipment which goes into the craft which they fashion, have been outstanding. Each and every one of them warrants the accolade, "Well Done."

THE SEXTANT CASE

A Navigator on Shore is Always a Suspicious Character. Here Are the Adventures and Misadventures of Mary Bowditch

Dear Priscilla:

With one sister on a swing shift and another working overtime in a war industry, I thought I would forego recreation this year and devote my vacation to serving balanced meals to my family and completing natural horizon sights required for this winter's celestial navigation course.

The balanced meal program is progressing nicely. We have only seven red points to last us through the next ten days but some pot roast is on hand and a little butter and Sister Jean is going away for two days, which will help. I make three custard pies a week to keep the milk from getting ahead of us and my sisters seem pleased and grateful for everything.

As for the celestial navigation work, I went down to Sandy Beach one Sunday for a meridian sight of the sun. Enthusiasm waned when I saw 10,000 people there. However, having worked up the time of transit and carried the sextant down, I decided to go ahead and started in on a series, with Sister Anne keeping the time and recording the readings.

About two minutes before the transit, a beach lifeguard came up and told me I'd have to stop. I finished the sight I was taking, then asked what was the matter — this wasn't a camera.

"I know. It's a sextant. You can see pretty far with those things, can't you?"

"Yes, but I was only looking at the sun."

"You can tell that to the police."

So I left Anne and went off with him. When we were half way up the beach, one of the bathers decided to drown. "Stand by," ordered the guard and went to the rescue. While I waited for him, I heard a spectator exclaim, "All these things at once, it's just too much!" For someone, I was part of a Roman holiday.

Rescue effected, we proceeded to the police. They happened to be with the beach director who said I was violating beach regulations. Binoculars and "any other instrument" as well as cameras were prohibited. He suggested that I take the sights somewhere else, away from the water.

Unhindered by anyone, I then left the beach with the sextant. On the way out, I met Anne who declined to go along till she'd had a hot dog. She gave me the notebook and watch and I went to Shell Beach for a swim, after a side sally for a last look where I'd taken the sights, to estimate "height of eye," which I'd need to work up the sights.

After the swim, I caught a bus and went home to get dinner. Having had the hot dog, Anne was leaving Sandy Beach somewhat later when a policeman tapped her shoulder and said, "Come with me, lady."

"Why?"

"Never mind, come with me."

He took her to the beach police station where there were another policeman and two sailors. The sailors, having decided we were Nazi spies, had had her picked up, and one of them proceeded to put her through a third degree.

"Who was that person on the beach with you?"

"My sister."

"Where did she go?"

"Over to Shell Beach for a swim, then home."

"She did *not* go to Shell Beach. She dodged down an alley-way on Case Avenue, and disappeared into a house."

"I'm sure she didn't. She doesn't know any people on Case Avenue, so she wouldn't go into their houses."

"Case Avenue isn't the way to Shell Beach."

"It's the nearest way. We've been using it for years."

"What's that inside your bathing suit?"

Anne pulled out her handkerchief.

"You *had* a notebook."

"Yes."

"Where is that?"

"I gave it to my sister when she left the beach."

"You were writing in it."

"Yes."

"What were you writing?"

"The numbers my sister called off as she took sights."

"I've seen a good many sights taken but never like that."

"My sister has studied navigation. She knows how to take sights and that was what she was doing."

"She was not — she was *getting locations!*"

Anne turned to the officer who had picked her up and said, "If you want to find out about us, two policemen, Archie Brown and Sergeant King, live on our street and they can tell you anything you want to know."

The officer went to the telephone and pretty soon Archie Brown arrived in a police car. He vouched for Anne and took charge of the case. The beach policemen expressed regrets. Not so the sailors.

Archie brought Anne over to Shell Beach but considerately stopped half a block away. "I won't embarrass your sister by coming down on the sand," he said. "Just ask her to come out to the car if she's there." I wasn't, so Anne stuffed her clothes in her bathing bag and Archie brought her home in her bathing suit. On the way, she passed several friends. She hoped they did not know there was a strict rule against policemen giving people rides in the police car except on business.

Meanwhile, after getting dinner well started, I went out in the yard with the sextant to take the index correction I had forgotten to take at the beach. As I came in the back door with the sextant, Anne and Archie came in the front. Anne said, "You're under arrest and, what's more, you're caught with the goods in your hand!"

Archie, who is doubtless used to having people upset when he appears, said soothingly: "No, you aren't, Miss Bowditch. I just have to ask you a few questions, that's all." So he did, about what I was doing, why I

(Continued on page 132)

The beautiful Virgin Islands, lying just east of Puerto Rico, are the most northerly of a long string of volcanic islands that stretch in the form of a bow to Trinidad, off the South American coast. The sheltered waters between the Virgins are ideal for cruising, as this air photograph shows

WHY NOT TRY THE WEST INDIES?

Something for the Cruiser to Look forward to When Peace Comes

By HERBERT L. STONE

COME the end of the war — and may that day be not too far in the future — your cruising man will be "rarin' to go," after his long confinement to certain restricted waters, with the necessity of having to get his hook down in some harbor by sundown each day and with blue water voyaging out for the duration. Even under these adverse conditions, the persistence of your dyed-in-the-wool cruiser has been remarkable, and many of those who have had the freedom to get away only for week-ends have kept their boats in commission and poked around in such sheltered waters as Long Island Sound or the Bay of the Chesapeake, even if they could not stick their noses outside.

But once they see daylight ahead, with restrictions removed, and those off-shore cruising yachts now in government service returned to their normal pursuits and restored to something of their pristine glory, we are going to see a resurgence of cruising that will carry the yacht sailor as far as possible from old, familiar waters and will dot our coasts and Great Lakes with sail and power craft to an extent never before known. For the unfamiliar is always beckoning, and the lure of the sea and adventure is as strong today as when, centuries ago, our sturdy ancestors shoved off to discover and settle half the world. Which does not mean, of course, that every cruising man will have either the boat or the time to go on long offshore voyages. But with the development of a fine fleet of seagoing yachts as a result of ocean and long distance racing, capable of extended voyaging with reasonable comfort, the urge to get off shore and visit strange waters will be harder than ever to resist.

To Atlantic Coast sailors, the cruising waters that offer the greatest possibilities to satisfy this urge to "go foreign" without taking an unreasonable length of time, yet for some reason are but little known to yachtsmen, are the West Indies, those islands that enclose the Caribbean Sea. In particular, the Windward and Lee-

Looking down one of the steep streets of Charlotte Amalie, St. Thomas, towards the harbor, which is an ideal anchorage and a good jumping off place for a cruise through the islands. Photos by Three Lions

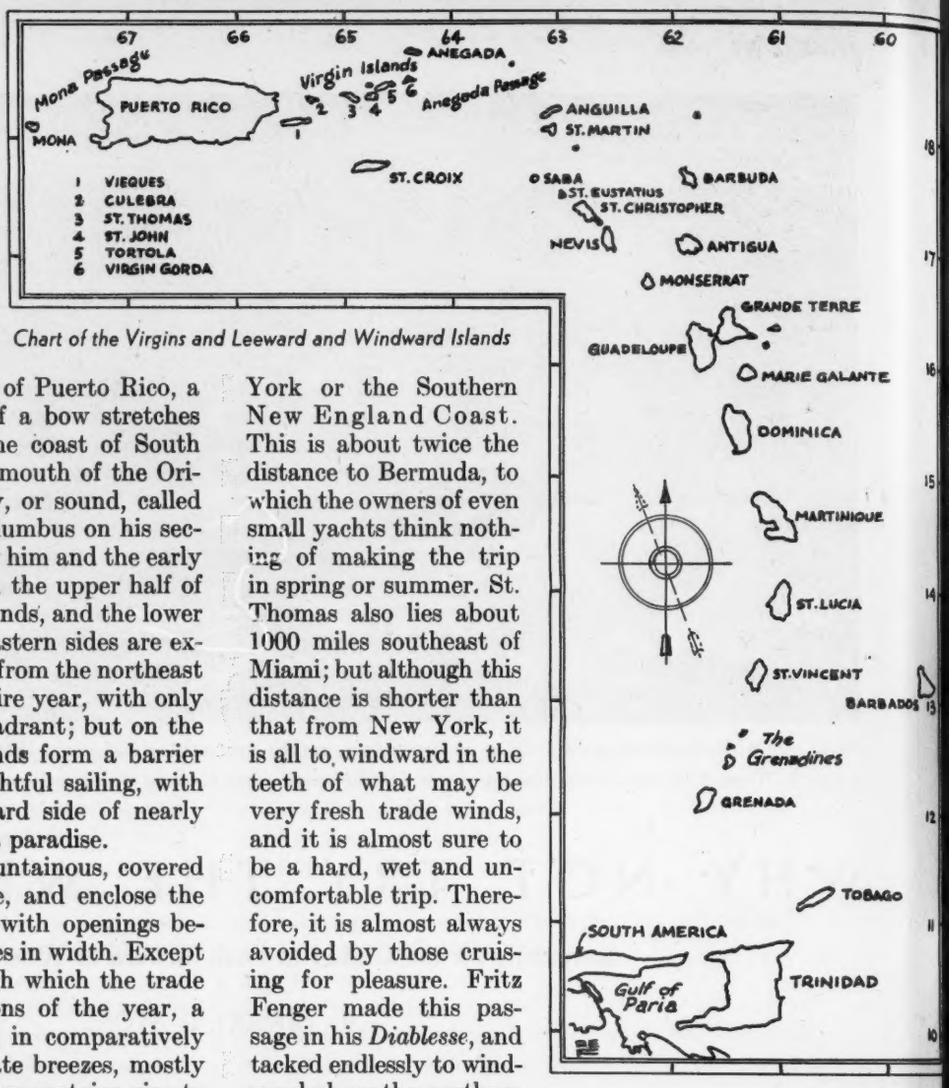


Chart of the Virgins and Leeward and Windward Islands

ward Islands of the West Indies offer as fine and varied a cruising ground as is to be found anywhere in the world. For some reason, they seem better known to British cruising men than to American, in spite of the fact that they are much closer to our coast than to Europe. At least, one sees, or hears of, more British yachts cruising there than American.

From the Virgin Islands, just east of Puerto Rico, a long string of islands in the form of a bow stretches southward for some 600 miles to the coast of South America, ending in Trinidad, at the mouth of the Orinoco River, which shelters a big bay, or sound, called the Gulf of Paria. Discovered by Columbus on his second and third voyages, and named by him and the early navigators who followed in his wake, the upper half of this group are called the Leeward Islands, and the lower half, the Windward Islands. Their eastern sides are exposed to the trade winds, which blow from the northeast to east-southeast throughout the entire year, with only occasional local shifts to another quadrant; but on the westward side, in their lee, the islands form a barrier which gives smooth water and delightful sailing, with towns and anchorages on the leeward side of nearly every island. It is veritably a sailor's paradise.

The larger of these islands are mountainous, covered with lush foliage, with a bold shore, and enclose the eastern end of the Caribbean Sea, with openings between them of not over 20 to 30 miles in width. Except when passing these openings, through which the trade wind blows freshly at certain seasons of the year, a yacht can cover the whole distance in comparatively smooth water and with only moderate breezes, mostly abeam. In many of the islands the mountains rise to 4000 feet or over and one can go the whole stretch, except for that between Trinidad and Grenada at the southern end, without losing the land except in case of rain squalls, which usually only last for a short time.

All this, coupled with the fact that the islands belong variously to the British, French, Dutch (and some formerly to Denmark) and the customs and habits are those of the home country, thus lending variety and color to the ever changing scene, makes these islands a cruising ground that has a particular charm and lure, and which should be better known to American yachtsmen. For a winter or spring cruise, the Islands offer advantages that cannot be found elsewhere off the East Coast of North America. The only deterrents in the eyes of many yachtsmen are the distance and the time involved in getting there. And yet these are not, or need not be, as great as one might think.

St. Thomas lies approximately 1400 miles from New York or the Southern New England Coast. This is about twice the distance to Bermuda, to which the owners of even small yachts think nothing of making the trip in spring or summer. St. Thomas also lies about 1000 miles southeast of Miami; but although this distance is shorter than that from New York, it is all to windward in the teeth of what may be very fresh trade winds, and it is almost sure to be a hard, wet and uncomfortable trip. Therefore, it is almost always avoided by those cruising for pleasure. Fritz Fenger made this passage in his *Diablesse*, and tacked endlessly to windward along the northern coast of Haiti and Puerto Rico, as he relates in an excellent book of his cruise through the Windward and Leeward Islands, the *Cruise of Diablesse*.

In going from New York under sail, or even from such southern ports as Charleston, it is best to make one's easting north of the latitude of 30°, in the belt of prevailing westerly winds, and then swing south for the Virgins so as to make a fair wind of the Trades when one reaches them somewhere south of the latitude of 25°. Remember that the Trades, in the winter time, are apt to blow as much from the east as from the northeast; and sometimes they even blow for days from the south of east; say east-southeast. And they may blow hard, from 25 to 35 miles in strength, which makes for dusty going in a small boat if the wind is forward of the beam. If one stops at Bermuda on the way down, this not only breaks the passage into two legs of perhaps four or five days each, but the course from Bermuda should give a fair lay to the Virgin Passage and St. Thomas. At any rate, if one elects to sail down, and is prepared to use power through any calm belts, some twelve days should be allowed for the voyage from New York, excepting under very favorable chances. I once did it in a commercial schooner of 150 tons in nine and one-half days, but we had strong, fair winds all the way.

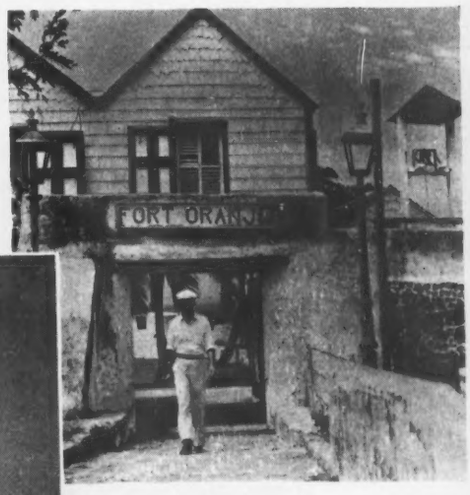
If one is limited as to time, another, and

View of the head of the harbor and the town, St. Thomas, with its picturesque mountain ridge in the background. Photo Furness West-Indies Line

The Island of St. Kitts (also called St. Christopher) from the leeward side. The lower slopes of the mountains are cultivated and green with sugar cane in season. Photo Furness West-Indies Line

THROUGH THE PICTURESQUE LEEWARD ISLANDS

Upper left, the Plaza in the old Danish town of Christiansted, Island of St. Croix, about 40 miles south of St. Thomas. Left, the island peak of St. Eustatius (Statia) as seen across the channel from the old fort on Brimstone Hill, St. Kitts. Photos Furness West-Indies Line

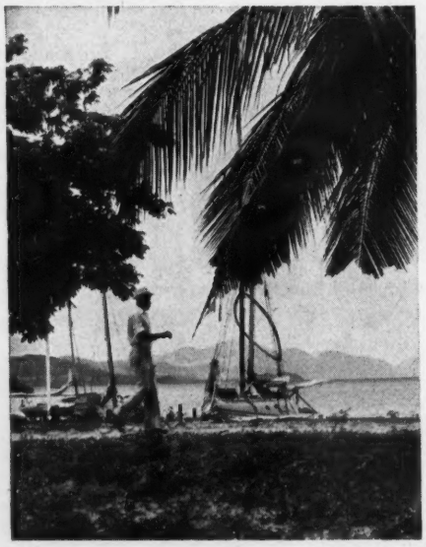


Entrance to old Fort Orange (above), St. Eustatius, where the firing of a salute in 1776 to an American armed brig was the first official recognition of the new Continental Congress. Photo by Three Lions. Left, Red Hook landing, St. Thomas, looking toward St. John Island. W. P. Colton photo

Landing and town of Fredericksted on the west end of St. Croix, as seen from the roadstead. Once Danish, the island is now a U. S. possession. Photo Furness West-Indies Line

perhaps a better, way of getting his yacht south is either to send her down ahead with a crew signed on for the passage, or to ship the boat down on the deck of a freighter or other steamer, if the yacht is not too big. A steamer can handle a yacht up to 45 or even 50 feet in length, and before the war the cost was not prohibitive. She could be sent either to San Juan, Puerto Rico, to St. Thomas, or to Trinidad, depending on which way one wanted to cruise the islands.

If one wants to visit other islands of the West Indies besides the Windward and Leewards, it would be advisable to start from St. Thomas, thence work eastward through the Sir Francis Drake Channel in the Virgins, to the French and Dutch Island of St. Martin's, which would bring the only windward legs in somewhat sheltered waters. Then swing south for St. Kitts (also called St. Christopher), or go farther east to Antigua if the wind was northeast, which, with its associations of Lord Nelson and his fleet, is well worth visiting. Thence, in the lee of the islands, let her go south, past, and visiting, Nevis, Guadeloupe, lovely Dominica, Martinique with its volcano of Mt. Pelee, St. Lucia, St. Vincent, Granada and Trinidad.



Small boat landing at St. Thomas. The yacht in foreground looks like an old friend, the "Kidney Bean." Photo, Three Lions

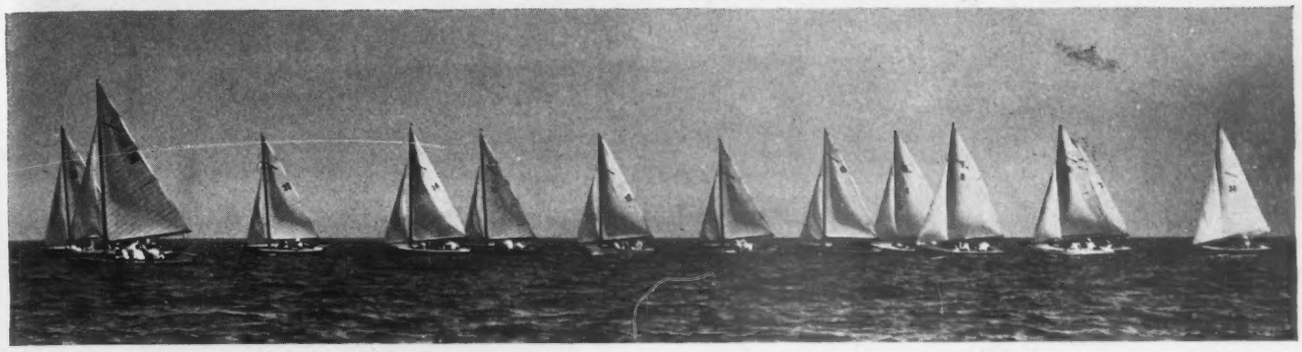
Then, for the return passage, one could slide before the Trades along the Venezuelan Coast some 450 miles to the Dutch Island of Curacao, and thence across the Caribbean, with the wind abeam, or abaft it, to the south side of Haiti (another 400 miles) and through the Windward and Crooked Island passages to Nassau and Florida. From St. Thomas to Trinidad and back to Nassau, some 2000 miles, with the prevailing winds always fair, the cruise could be made in less than six weeks, with plenty of time for all the stops that were alluring.

If one's time were more limited, then the boat should be shipped to Barbados or Trinidad by steamer, or sailed directly there if she were too big for shipment, and the cruise made from south to north, sailing up in the lee of the Windward and Leewards, with a stop at every island, beginning with lovely Grenada. At St. Thomas, one could then swing westward and coast along the southern shores of Puerto Rico, San Domingo and Haiti, and thence to Nassau and Florida through the Windward Passage between Haiti and Cuba, as before, a distance of some 1600 miles, which could be covered in some four to five weeks if need be, although one would want to linger longer at some of the colorful little ports if time could be stolen for it.

As to the size and type of yacht best suited for such a cruise, much depends, of course, on what one is used to sailing and handling. It could be done with a very small boat if she were sturdy and well found. From 30 feet up would do it safely, but there would not be much comfort in 30 feet or much room for ice and supplies, and it frequently blows hard through the openings between the islands when the Trades are fresh. But these wet stretches would be followed by smooth sailing in the lee of tall hills and mountains, their heads usually covered by fleecy trade wind clouds. From 40 to 50 feet of length would be plenty large, and most of the fleet of Bermuda racers could do the trip with ease. A motor sailer, with a speed of 8 knots, would be ideal for the cruise, and a power cruiser, if designed and built for open water, could do it nicely if she could carry enough fuel. While fuel can be had at all the larger ports, there might be some difficulty in taking it aboard, as service stations as we know them in the States are not often found, except at St. Thomas, Trinidad and one or two other places. With a power boat, one could always make the hops between the islands when weather conditions permitted in from one to two or three hours. But the boat, whatever her size, should be able to "take it" on occasion, although it seldom gets very bad and, when it does, there is always a port on the lee side of some island where one can wait until the Trades moderate. As a rule, they blow harder in the daytime than at night.

In the foregoing, I have given only a general picture. In the next issue will be a more detailed and intimate description of the cruise that will be of help to anyone making the trip when the war ends.

Off the town of Basseterre, St. Kitts. This open roadstead in the lee of the mountains gives a good anchorage. Native boats ready to take one ashore. Photo Furness West-Indies Line



The start of an Arrow Class race. It was won by No. 16, with 33 second and 31 third. F. W. Johnson photo

THE LAKE MICHIGAN ARROW FLEET

A Class of 18-footers that is one of the Most Active on the Great Lakes

By DOROTHY and JIM HOLSTON

NEW one-design classes often grow at remarkable speed for a time but, due to features of the design or to the lack of building facilities, are limited to local use. However, the Lake Michigan Arrow fleet shows signs of attracting attention far beyond the limits of the Chicago district. One section of beautiful Wilmette Harbor boasts of a fleet of 23 of these little craft, the first of which was launched in 1937.

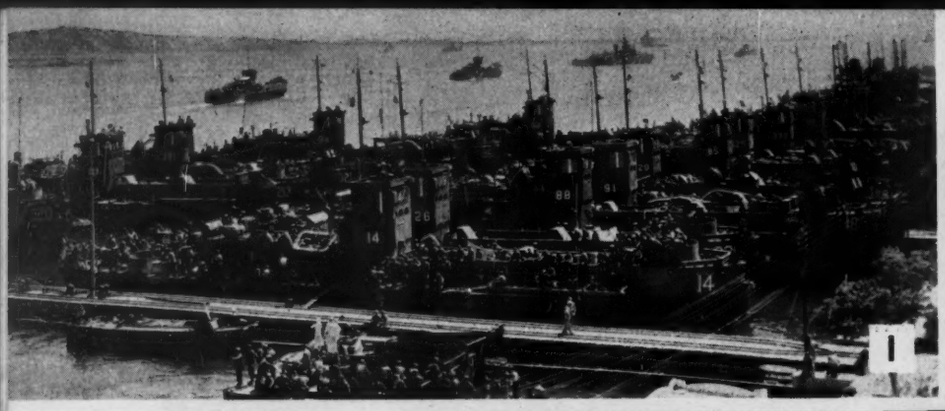
The Class has an interesting history. The present commodore of the Sheridan Shore Yacht Club, Al Brittain, commissioned A. M. Deering, naval architect of Chicago, to design the first Arrow in 1937. Jens Christensen, who came to this country from Denmark as a young man, built the first one in his Chicago yard and has since turned out 60 of the present fleet, which numbers a total of 100. (Jens is now building boats for the government but the war is not going to last forever and, when it is over, he will return to his Arrows. A master boatbuilder, he is satisfied only with the best workmanship.) The following year, there were seven boats of the class in Wilmette Harbor alone and others elsewhere. Last season, 22 boats of the Wilmette Fleet were actively raced.

Day sailing is popular in the Chicago area since there are not many harbors near to encourage cruising. Interest in racing the Arrows is great and competition is keen. Forty-seven races were scheduled at Wilmette for 1943, including contests on Saturday, Sunday, Wednesday (evenings) and holidays. Ladies' races, with the suf-

(Continued on page 134)

An Arrow full and by. Note the roomy cockpit

Looking for the mark. F. W. Johnson photo



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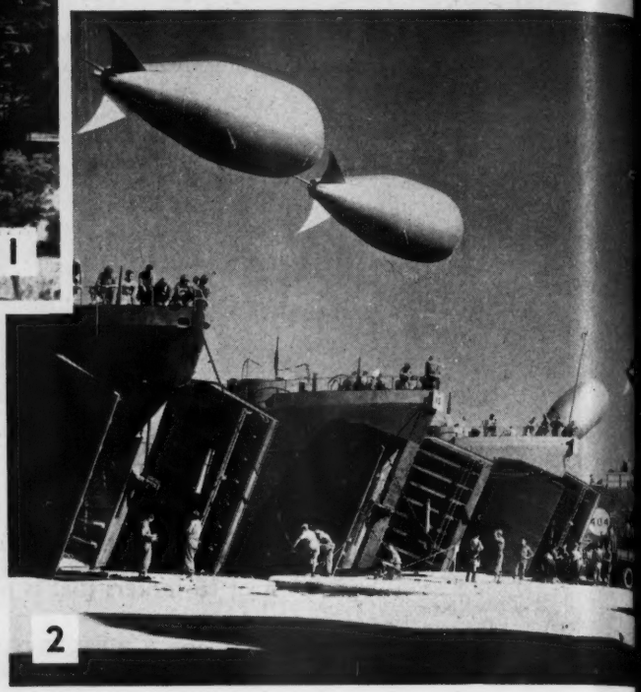

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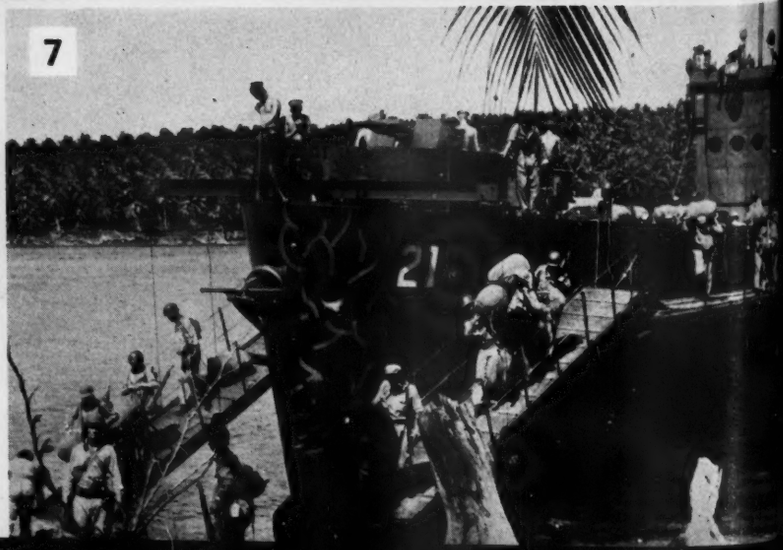

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OATS ARE AT THE "FRONT"

Never before in history have boats, and particularly small craft, played so important a role in a major war. 1. Landing craft of every type shove off for the Italian mainland. 2. LSTs, guarded by barrage balloons, at a Sicilian port. 3. A South Sea native serves as "harbor master" for an inbound LCT. 4. Guns, men and vehicles are not the only equipment brought in by landing craft. 5. One of the Coast Guard's sailing patrol slips by a convoy. 6. LCPs are armed with two light machine guns. 7. An LCI unloads her human cargo in a South Pacific harbor. 8. Heavy traffic on a jungle stream. Supplies going up, wounded coming down. 9. Lt. Gen. Mark Clark on board a PT in the Gulf of Salerno. 10. A Coast Guard "83" with a bone in her teeth. 11. Camouflaged Higgins PTs at Salerno Bay. 12. Her job completed, this landing craft awaits the salvage crew. Official Navy, Coast Guard and Signal Corps Photos

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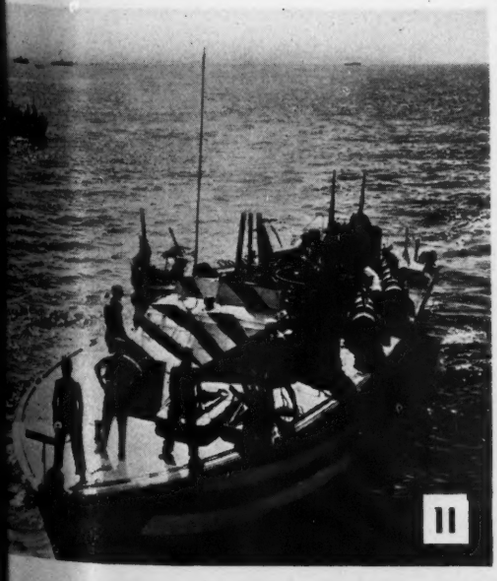

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PLASTICS AND TOMORROW'S BOAT

After Years of Experimentation, Plastics for Marine Applications have Come of Age. Here is a Description of One Type which is Now Being Put to a Variety of Nautical Uses

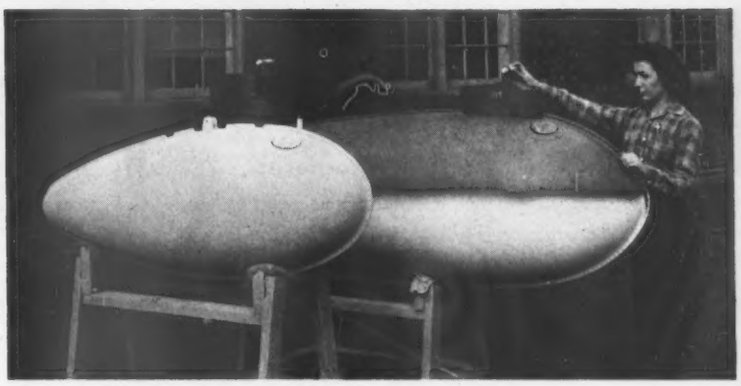
By FRANK R. METCALF and KENNETH H. BOWEN

FOR MANY years, one of the favorite subjects of the Sunday supplements and the star gazers, has been a forecast of the many places in which plastics would and could be applied. Of course, much of this talk has concerned the manufacture of all types and sizes of boats. Such talk is oftentimes more harmful than beneficial. Nothing is more detrimental to any projected product than to describe it in too glowing and sometimes misleading terms.

Several months ago, we had the opportunity of describing to the editors of YACHTING the strides that the Columbian Rope Company had made in the development and use of a plastic called Co-ro-lite. We had with us a small model boat made of this material, a picture of which is included with this article. They were interested in the applications of such material to the boat building industry and asked us to describe the process, the material and the possibilities which it might have for the boating fraternity. At the outset, it is important to explain that the material is a reinforced plastic and, as in reinforced concrete, the reinforcing adds strength.

The popular conception of the ideal boat from the owner's point of view would probably encompass the following requisites: she must first of all have the best of lines; she must be a true ship in every way, not designed with the idea of fitting the boat to the materials, but the materials to the boat. This is a most important point, as the present trend in small boats has been, generally, a design with the former view in mind. The present V-section boat, although sacrificing the flowing lines of the more expensive boats, does have the definite advantage of bringing down the price of stock boats and thus enlarging the use of small boats generally.

A second point to be considered in either a molded or a conventionally built boat is the requisite of good performance. By this is meant that any boat, by whatever means constructed or of whatever material, must have those qualities which will make for safe and economical use. Any material should be capable of reproducing the best efforts of the yacht designers and should be adapted to the construction facilities of the boat building industry.



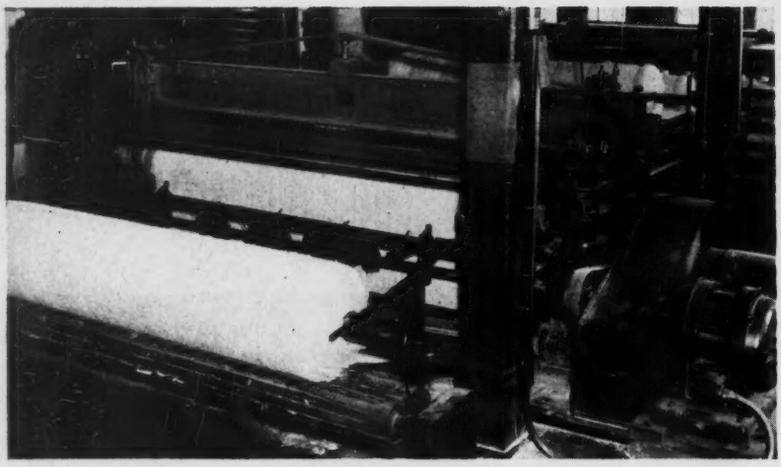
The completed jettison tanks. Here are two different sizes

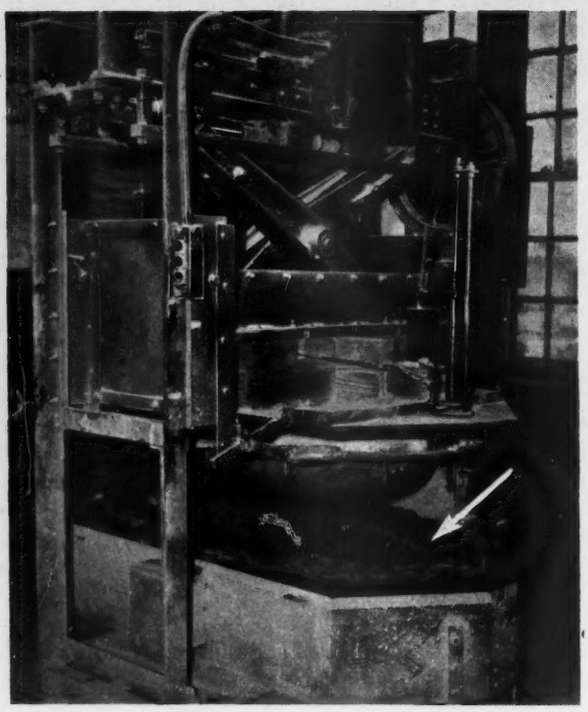
Cost has always been one factor which has tended to check a great potential demand for boats of all types. It has probably been the chief, if not the only, complaint which has never been satisfactorily met. If the potential customer has unlimited resources, a builder can produce whatever is designed. But, unfortunately, this happy condition applies to only a small fraction of those interested in boating and, therefore, it is necessary to design and build to a price which a greater number of the boating public can afford. We are, then, faced with two choices: 1, keep the same designed boat at the same price; or, 2, develop new methods for fabricating a boat's hull which will give either a better boat in the prevailing price range, or a boat equal to those now in use, but at a cheaper price. From the work that has been done with Co-ro-lite up to the present, we feel that interesting possibilities are on the horizon when considered from the second hypothesis.

From the standpoint of the owner, the next most important item is the upkeep of a boat. Any plastic material must have the ability to "take it" over a long period of time, must be able to take and hold paint, or have the finish molded on the original boat. It must be resistant to the inroads of the various marine growths and organisms which have proven so destructive to hulls made of wood. It should be completely inert, not susceptible to electrolysis. Boat hulls or sections made of a plastic should not warp. It also goes without saying that any such material should be leakproof, should be readily repairable, and should be capable of molding as nearly in one section as possible.

Turning now to the builders' requirements for boat building material. First in importance, no doubt, is the relative cost of building by conventional methods or by the low-pressure method used in the molding of large sections of plastic material. One of the principal costs of

Possibly not the last word in hull design, but this "Co-Ro-Cat," made by bisecting a plastic jettison tank and rigging the "hull" with a Penguin rig, proved that this type of plastic material could withstand the action of water, sun and wind





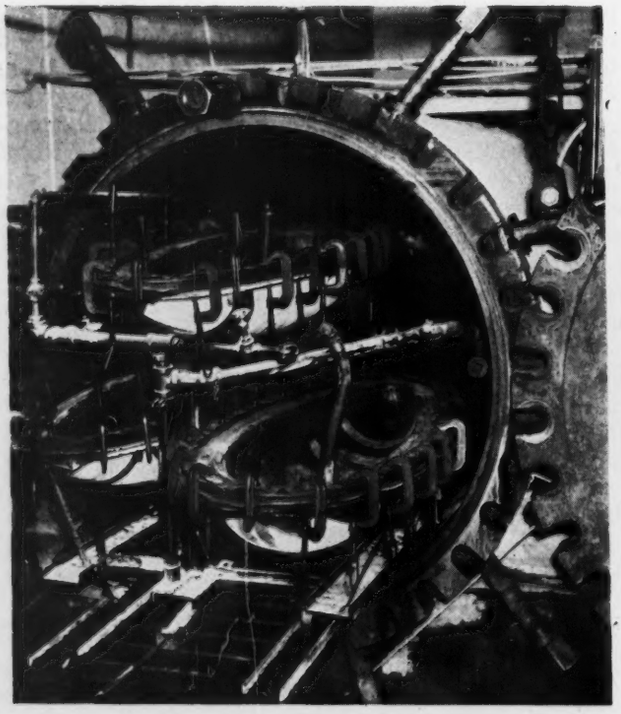
The fiber is needled or felted by machines such as these. Right, here is the operation by which the felted blanket is preformed, in a simple operation, into the desired shape or form

building any fabricated part, be it a house or a boat, is the labor which goes into the part. When we speak of the new art of molding, it is not with the thought of cutting out the part of labor in the assembly, but of reducing the cost per unit, thus greatly increasing the number of units produced.

How will this reduced cost be brought about? As will be described later, the process consists of placing the preformed, impregnated sections in the mold along with the reinforcing members, and molding at a predetermined pressure and temperature for a specified time, which should average about 15 minutes. There are great possibilities that the finish can be put on the hull during this process. If so, such finish would be permanent and would require only slight servicing each year, but probably no more of the customary annual repainting. More likely, it would be similar to the surface of the modern refrigerator, requiring only the retouching made necessary by scratches and normal weathering. When the "cook" is done, it will be simply a matter of putting on the finishing touches, which is common to all boats.

Perhaps the next point of interest to the builder will be the possibility of introducing new ideas and new methods. Although time and the war effort have not allowed much in the way of development, it has been possible to make small sample pieces. Among such samples, is a rope rub strake, which can be made either as a permanent or a removable part. It is also felt that much can be done in molding in the chain plates, cleats, etc. It must be emphasized that so far only the surface has been scratched in this work. Given time from exacting war tasks, it is felt that the yacht designers can work many innovations from the plastics which will come from the laboratories of the war plants.

Doubtless, the builder who has keyed his war-time work to the building of all types of craft in the conventional manner will cast a questioning eye at this new method of construction. There is no question that the boating industry has done a marvelous job in making the nation's sea arm strong. But the very fact that they were able to jump from a relatively small industry to a large one in such a short time, would tend to prove that new methods can be adopted without too much conversion. It is not believed at the present time that the cost of installing equipment to handle this new material will be excessive. Formerly, it was necessary to use a large autoclave, but developments now being used make it likely that newer and cheaper methods will be devised.



Loading the autoclave. Left, the preformed shell is placed in the mold. Note the materials which are employed in the molding process: cellophane lining, flange ring and victory cloth

Some years ago, the New Products Laboratory of the Columbian Rope Company found that the addition of resins to a long staple fibre, such as a rope fibre, increased its strength many times. This applies particularly to tensile strength and resistance to shock. The resulting material was labeled Co-ro-lite and placed on the market, being sold to the molding industry as a conventional high pressure molding material where high strength was needed. The war has, of course, accelerated all types of research and the plastics industry is no exception. Critical shortages in metals made it necessary for the aircraft industry to substitute other less strategic materials. Plastics were needed for the construction of larger objects in the aviation industry. Co-ro-lite was found particularly adaptable, as the basis of this plastic is a large sheet of felted fibres, the felting being accomplished without destroying the staple or fibre length. It should be remembered that strength depends on staple length as well as on the type of fibre used. Rope fibre, of course, is well adapted to this employment.

After being removed from the autoclave, the half-shells from which the jettison tank are made are taken from the molds

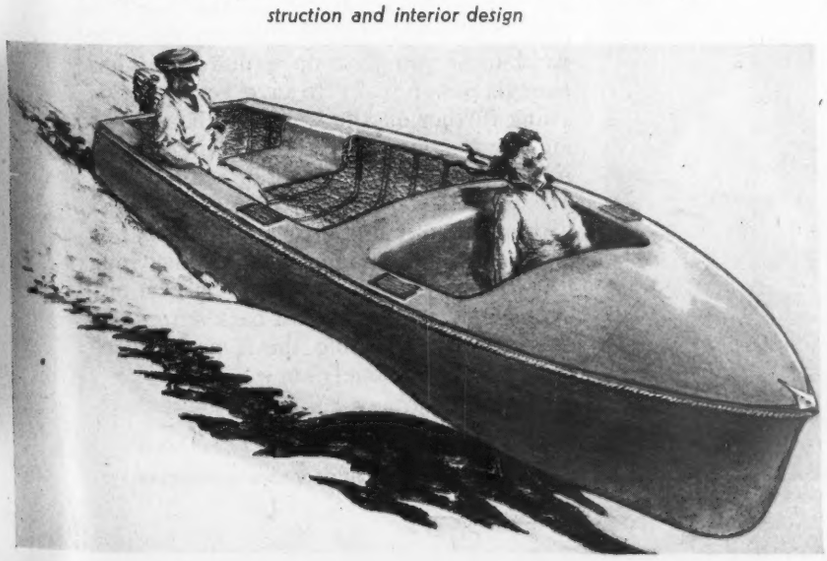
Picturing this blanket of strong felted fibres, in widths of 10′ and continuous in length, we can readily visualize passing this material through a machine which distributes the resin thoroughly and evenly throughout the mass. Usually, powdered resin is used to eliminate drying and the loss of solvents. The next step is, without doubt, the most important. The impregnated felted blanket must now be cut or "clicked" into any convenient shape to form a "blank." Processors of sheet metal will know the function of a blank in metal forming. The blank is laid in a forming press and drawn into any desired shape, called a preform, and is now ready for molding. This is one of the outstanding advantages of this material, and one can visualize a boat hull made from one piece of material with no seams, lap joints, multi-plies, or built-up construction. The molding is simply accomplished by placing in suitable molds and, with a short "cure" of as low as several minutes, the cycle is completed and the molded object ready for assembly.

War work has found many applications for Co-ro-lite. These have made it possible to make comparisons with more conventional materials. One of the largest uses has been in the manufacture of jettison tanks for the Navy.

In case you do not know, a jettison tank is used by a combat plane as an auxiliary container for fuel until an emergency arises, such as an encounter with the enemy, in which case, the tank (carried externally) is jettisoned or dropped from the plane. In other words, a fighter, observation plane, or dive bomber has a much greater cruising radius with a jettison tank.

Tanks with a fuel capacity of 186 gallons and measuring 9′ in length have been made on a production basis from this material. This is an interesting application for a high strength material, inasmuch as the stresses of a jettison tank carrying 1100 pounds of fuel riding on the outside of an airplane are very great. Changes in direction, take-offs, dives, landings, will often build up loads as high as 7 "G," or seven times the static weight. Aside from this, of course, the tank must be light in weight (approximately ½ pound per gallon). The strength of Co-ro-lite is best demonstrated by the fact that the loads for this application were taken mostly by the shell proper, very little internal reinforcing being necessary. Production of these units has been in very large quantities as compared to that of boat hulls of a given design, or to streamlined superstructures or boat fittings.

A single mold plastic runabout of conventional size and unusual construction and interior design



The physical properties of this plastic, as has been previously mentioned, center about its high impact strength and relatively high modulus of elasticity, particularly in flexure. Most readers of YACHTING would be bored with a compilation of these figures, so we are content in this article to merely hit the high spots.

What can Co-ro-lite do for the boatmen of the country? A program has already been launched to find places for this new material in a post-war America, not the least of which is the construction of boats.

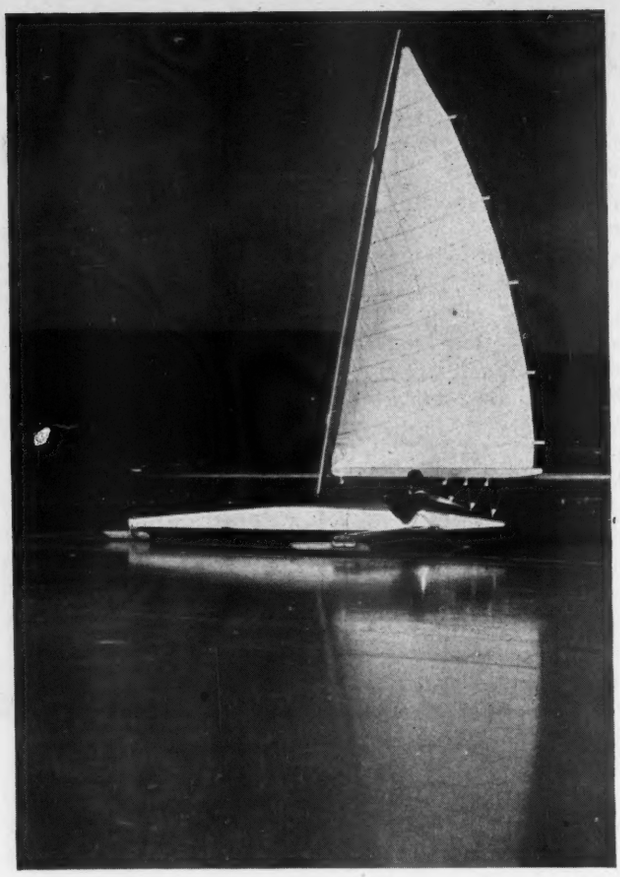
The jettison tank shells may have made us conscious of this when we first began to make them, for they are very similar in shape to a Kayak, and requests from employees to take a rejected one home resulted in finding them in some lake or pond with a youngster at the

(Continued on page 136)

ICE BOAT RACING—A FEW DO'S AND DON'T'S

Part I—Looking Over the Course Before the Start

By RAYMOND A. RUGE



A cat rigged "Skeeter," a Class E front steerer, a modern type of ice boat. A. F. Sozio, from "Wings on the Ice"

EVERY ice boatman loves to race; "cruising" and "day sailing" are practically non-existent. Every ice boatman is constantly working on his boat, and 95 per cent of his effort is directed toward an increase in speed. Races are so short, and one wears so much padding in an attempt to keep warm, that comfort is a secondary consideration. Speed is paramount, and there are no limits to the efforts your typical ice boatman will make to get just a little more out of the old hooker.

Having discussed basic ice boat design and sailing in an earlier series of articles (YACHTING, November, 1942, through February, 1943), it is logical to take up ice boat racing, the problems which confront the racing skipper, and on the solution of which his success or failure so largely depends. There is no simple formula for success here any more than there is in summer time yachting. As in the waterborne sport, every day's weather, every race course and every group of competitors present new problems. In any given race, the skipper who copes most successfully with the greatest number of these problems will stand the best chance of coming home in front. Further, a failure to solve any one of them will be enough to injure his chances severely.

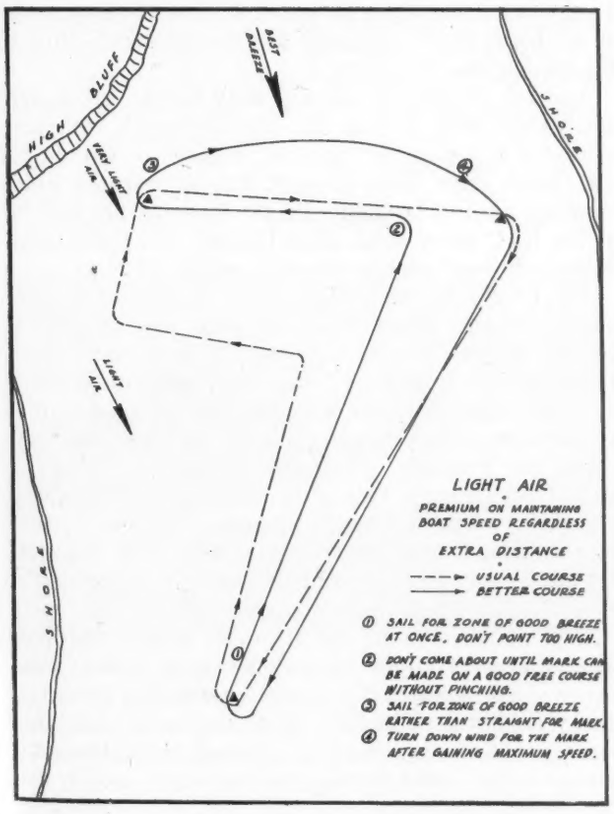
First, then, sailing conditions are subdivided into (a) Wind and (b) Ice. One point offers the clue to most sail-carrying problems: a boat carrying too much sail is handicapped just as severely as one carrying too little. It is obvious that insufficient sail on a light day will kill a boat's performance. It is not so obvious that a boat lugging too much canvas in a blow is unable to do her best.

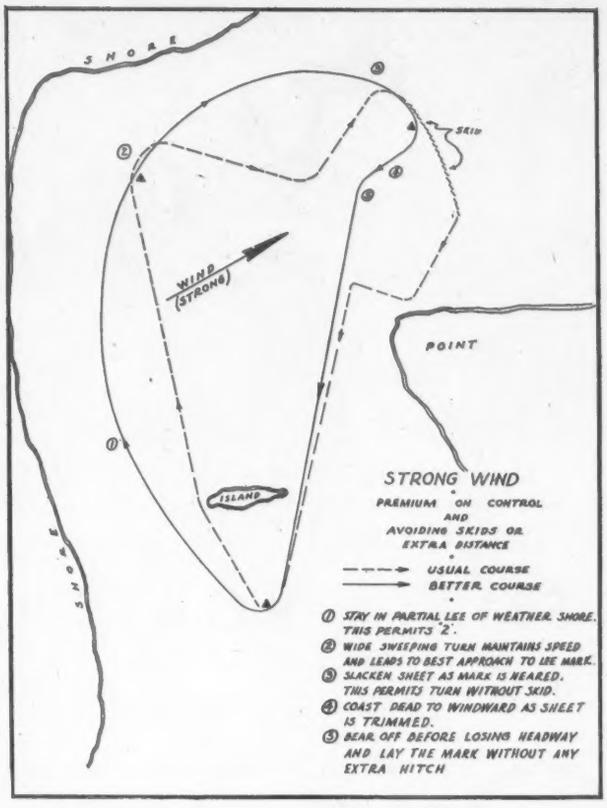
(a) Wind. In the lightest airs carry full sail, and set the battens to give plenty of draft. Keep your sails well off and make every effort to keep moving rather than to point high, particularly at the start. Trim closer and point higher should you build up enough speed to warrant, for any real increase in speed will pull the apparent wind around towards the bow and cause a luff, to be cured only by trimming sheets. Do not try to "squeeze" speed out of the boat by frantically trimming the sheets the moment you hop aboard; more often than not you will only succeed in killing her way altogether. Let her speed build up and trim sheet *gradually*, just enough to keep her from luffing. In this way you can steadily increase speed until you are making all the wind is good for. Then continue to sail carefully, maintaining speed at all costs rather than trying to point high. Luff in the puffs and sail freer in the slack spots between puffs. As you start the downwind leg, turn the weather mark in an easy swing, and don't, for Pete's sake, turn straight downwind if you hope to get anywhere. Remember that the wind is *light*. Sail off at 90° to 120° to the true wind until you pick up a puff. If it has enough power really to give you a boost, swing further off the wind, to about 150°, and try to stay with it. Often a puff can be ridden right through a fleet of boats by the one boat that "happened" to have good way on when it first struck in. This is not *luck*, it is good management. Make your jibe to the opposite leg before you run out of this puff, and try to sail back across the course while still using the same piece of wind. It *can* be done!

Contrasting types of ice boats seen at a regatta. Both cats and sloops are represented

In medium breezes, carry full sail but set your battens with less curvature, or use stiffer ones, since the higher speeds attained will call for a flatter sail. Start "full and by" but be quick to trim sheets and build up to your maximum speed. If the breeze is "spotty," remember to give her more sheet the moment you feel a definite slackening of pull on the main sheet, and to trim in again as soon as she begins to pick up. *A flat-trimmed sail has practically no power at slow speeds.* The downwind leg may be sailed a little less delicately than in a light air but the technique of riding *across* the direct course until you pick up a puff, and then running down with the puff, is still a good one. Of course, if the puff happens to come just as you turn the weather mark, thank your lucky stars and swing off to a full 150° to the true wind right away.

In strong winds, carry the smallest sail that will get you started. You will be amazed how small a piece of canvas this can be. I have used a Class E sail on a 700 lb. Class C boat, and made all the speed it was possible to make without carrying away something vital. On this occasion, I remember carrying a steady hike for 30 or 40 yards, with a tiny little sail that looked ridiculous in proportion to the boat and spars. Experience has proved again and again that in a strong wind too much canvas is a far greater handicap than too little. Too much canvas means spilling wind, which means a flapping sail, which, in turn, is a most effective air brake. A tiny sail, sheeted tight home, stiff and unflapping, will get you there a lot faster — and a lot safer, both for you and the boat. The only catch is that you must get up to speed before you can trim a tiny sail close. Start with a good rap full and get rolling before you try to trim sheet and point. Never mind the other boats or the course, *get going.* Use stiff battens, and have them well taped, especially the after two or three feet, as the terrific slatting when coming about can easily break them and start a rip in the sail. (The principle involved


HIGH BLUFF
BEST BREEZE
VERY LIGHT AIR
LIGHT AIR
SHORE
SHORE
LIGHT AIR
PREMIUM ON MAINTAINING BOAT SPEED REGARDLESS OF EXTRA DISTANCE
USUAL COURSE
BETTER COURSE
① SAIL FOR ZONE OF GOOD BREEZE AT ONCE. DON'T POINT TOO HIGH.
② DON'T COME ABOUT UNTIL MARK CAN BE MADE ON A GOOD FREE COURSE WITHOUT PINCHING.
③ SAIL FOR ZONE OF GOOD BREEZE RATHER THAN STRAIGHT FOR MARK.
④ TURN DOWN WIND FOR THE MARK AFTER GAINING MAXIMUM SPEED.


SHORE
SKID
WIND (STRONG)
POINT
ISLAND
SHORE
STRONG WIND
PREMIUM ON CONTROL AND AVOIDING SKIDS OR EXTRA DISTANCE
USUAL COURSE
BETTER COURSE
① STAY IN PARTIAL LEE OF WEATHER SHORE. THIS PERMITS '2'.
② WIDE SWEEPING TURN MAINTAINS SPEED AND LEADS TO BEST APPROACH TO LEE MARK.
③ SLACKEN SHEET AS MARK IS NEARED. THIS PERMITS TURN WITHOUT SKID.
④ COAST DEAD TO WINDWARD AS SHEET IS TRIMMED.
⑤ BEAR OFF BEFORE LOSING HEADWAY AND LAY THE MARK WITHOUT ANY EXTRA HITCH

in the effectiveness of the small sail is that, with double the wind velocity, only one-quarter the sail area is needed to produce the same amount of power.)

(b) Ice. The condition of the ice surface, as well as the wind strength, determines the runners to be used. Ice conditions often vary considerably during a single day. Hence runners must be easily interchangeable, so that there will be no temptation to stick to the wrong set because it is too much trouble to change. A complete runner change ought to take not over ten minutes at the most, if riding bolts are in good condition with easily working threads and with cotter-pins that aren't too stiff to be bent easily. Soft copper or brass wire is ideal for cotter-pinning, since it can be bent with the fingers.

There are, of course, many types of runners but the following three basic forms ought to see you through any conditions under which a race would be sailed: (1) Heavy cast iron, about 70° cutting angle, fairly flat blade, for high winds and hard ice, where skidding and excessive hiking are the major problems; (2) medium heavy cast iron, about 85° cutting angle, slightly more rocker than type (1), for medium to light breezes on hard ice, or for high winds on soft ice, where set (1) would dig in too much. These are your general purpose runners and will prove to be right for 90 per cent of the conditions under which you can expect to race. (3) T iron, fairly flat, sharpened to about 85°. For a Class E boat, these can be of 1¼" by 1¼" by ¼" stock; for Class D or Class C, they should be of 1½" by 1½" by 5/16" or even ⅜" as the ¼" T will "chatter" at high speed and will dull itself rapidly. These are for use on hard ice only, and particularly when the breeze is very light or the ice has a light covering of snow. When light snow becomes windpacked, the resistance of a V-shaped cast iron runner will almost stop the boat, while T-iron shoes will zip through it like steel knives. T iron should *not* be used on soft or slushy ice since it is dangerous,

(Continued on page 142)

It takes all kinds of boats to make a Fleet. South Pacific natives are now as familiar with small American vessels as they are with their own local craft. In the background, center, is an SC subchaser, and to the right is an APc. Official U. S. Navy Photo

SMALL BOATS IN WORLD WAR II

By L. W. VANCE, *Lt., USN*

OF THE 2500 to 3000 vessels that took part in the invasion of Sicily, the majority were small craft — infantry landing barges, mine sweepers, submarine chasers, patrol craft, tank landing craft, support vessels, control vessels, aircraft rescue vessels and the much publicized motor torpedo boats. The role played by these vessels in this gigantic operation was a tremendously important one, and they came through with flying colors. Generally speaking, the existence of the Navy's vast small boat fleet, as well as the duties they perform, has heretofore been little known to the American public, but the performance of this heterogeneous flotilla will become more and more familiar as the war progresses and amphibious operations on an even larger scale take place and become generally known.

The small boat fleet is necessarily a heterogeneous one in view of the fact that most of the boats are designed to perform but one type of duty. To differentiate between the various types now in service, the Navy has assigned to each type a designating combination of letters; for instance, an SC is a subchaser, a PC, a patrol craft and an AMc, a coastal mine sweeper. These vessels are on duty today in every part of the world and often turn in performances that would do credit to any larger warship, even though the largest of them do not exceed 200′ in length. An SC, for instance, is but 110′ in length and a PC, 173′. The cousins of the PCs, the PCEs and PCSs, are 180′ and 136′ long, respectively, and have exactly the same type of duty — anti-submarine patrols and convoy operations.

Anti-submarine patrol operations are conducted wherever enemy submarines can be expected to appear. The SC and PC groups operate not only in the Atlantic and the Mediterranean, but in the Pacific as well. In addition to their regular duties, they are also called upon to fulfill other types of assignments for which they were never built. Sometimes these unlooked for assignments turn out rather strangely; as in the case of a subchaser that had taken part in the landing operations on the beach at Salerno and was ordered to proceed to another port to deliver two empty landing craft to a certain American naval officer.

"We first realized something was wrong when somebody started firing at us," the skipper said. "We couldn't tell whether it came from ships some 10 miles out on the horizon or from shore. There were two possibilities," he continued, "that friendly ships were shelling the vicinity of the port where enemy units might be isolated, or that enemy ships were shelling the Allied held port." Suddenly, they realized the firing came from shore batteries. It took three-quarters of an hour, under constant fire, for the little ship to zig-zag her way to safety.

Another out of the ordinary duty for the subchasers and patrol craft during the Mediterranean campaign consisted of acting as "control" vessels, or guides, for the bigger ships when entering strange harbors where landings were to be made. Under constant fire and far in the lead, these little ships braved uncharted minefields to bring their big sisters in safely.

Not all of the small boat fleet are engaged in anti-submarine operations. Many of them are assigned to far less glamorous although equally important work. Take the minesweepers. They, too, operate in every theatre of war, but their duties can almost be described in one word — monotonous. Day in and day out, they sweep the channels of friendly harbors by means of special apparatus attached to some part of the ship. Once in a while, as during invasion operations, they may be called upon to sweep enemy held channels, but outside of these few and far between opportunities for excitement, their work is mere routine.

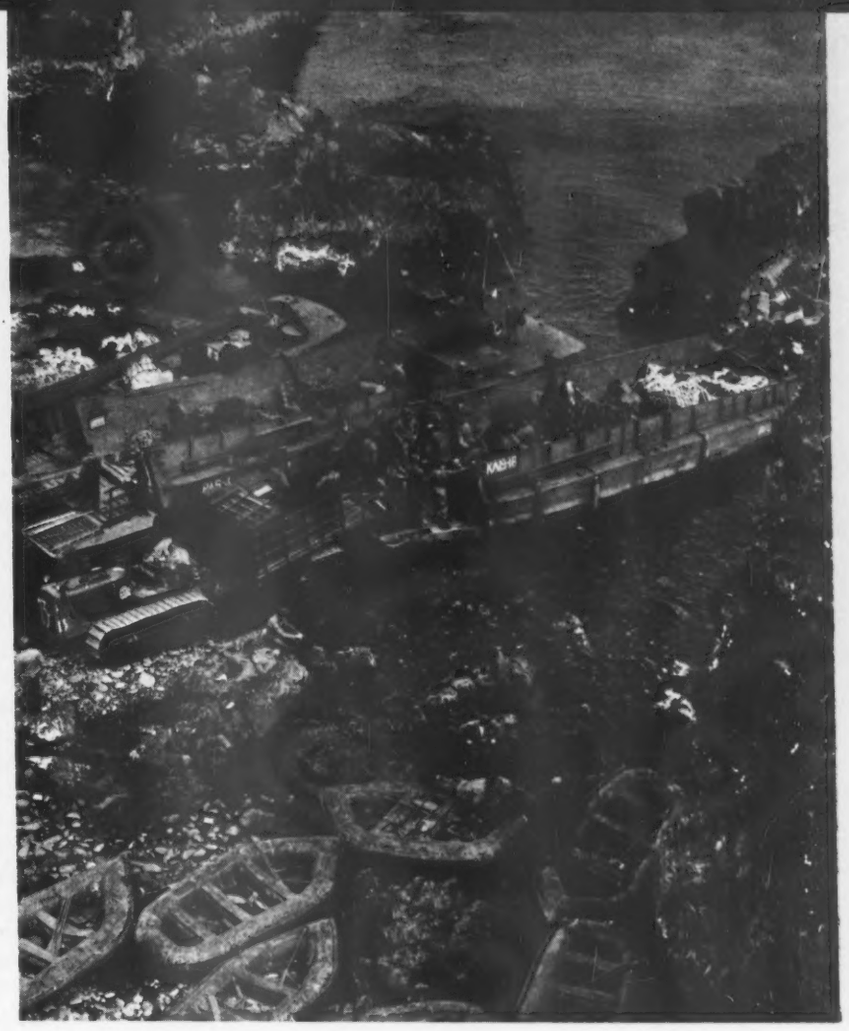
Airplane rescue craft are also part of the small boat fleet. Wherever Allied aircraft fly over water, these mercy ships operate, oftentimes penetrating deep into enemy held waters to fulfill their missions. Their chief purpose is to rescue personnel; although they attempt to salvage as much of a floating plane as they possibly can.

Many other types of Navy-built small craft are now in service throughout the world. PTs, gatekeepers, fuel oil carriers, gasoline barges, LCIs, LSTs and LCTs (landing craft), salvage boats, towing vessels, and numerous other classes of naval auxiliaries form the small boat fleet. Usually possessing only a small part of the required range, they are "herded" across oceans by mother ships that supply them with water, provisions and fuel at frequent intervals. But this fleet was not acquired overnight.

With Pearl Harbor, the Navy found itself short of small auxiliary craft to carry on patrol, rescue and salvage work. Hundreds of motor boats, steamers, tankers, water-taxis, barges, scows, fishermen, towing vessels and cruisers were either received as gifts or requisitioned — purchased and immediately converted into naval auxiliaries. Vessels were taken from every port in the U. S. and even from Japanese in Hawaii. Unlike combat vessels, the work of these small craft has seldom been publicized but, nevertheless, they are playing a major part in the winning of this war.

On September 1, 1939, the Navy's small boat fleet consisted of three 65′, fifty-four 75′ and seven 100′ ex-Coast Guard cutters which it had received with the repeal of prohibition. During 1941, several dozen more yachts and fishing vessels were added, but considerable time was spent in converting these boats from civilian to Navy use. Immediately after December 7th, both the rate of acquisition and conversion was stepped up in order to meet the rapidly growing submarine menace. By the end of 1942, three hundred and ninety-one more boats of all types had been pressed into service and, during the first three months of 1943, thirty-four additional vessels hoisted commission pennants.

The most pressing demand for these boats was for anti-submarine work, and the majority of them were immediately marked for patrol duty. Those that had been built as tankers, scows, barges and towing vessels, however, were assigned, whenever possible, to the same general type of duties which they had performed during their civilian careers. All of the boats were classified first as to size and then according to the nature of their general assignments. Those between 170′ and 250′ and possessing roughly 400 to 1000 hp. were designated as PYs, the "P" standing for "patrol" and the "Y" for "yacht." Vessels over 50′ and under 170′ were generally classified as "District Craft" and, as such, were subdivided into more than thirty "Y" classes according to their use. A "YP," for instance, is a patrol boat. Similarly, a YHB is a houseboat, a YMS is a minesweeper; a YDT, a diving tender and a YW is a water barge. Boats over 250′ in length are generally classified as PGs, or Patrol Gunboats; those under 50′ are known simply as "Small Boats." Some boats can not be classified in any of the above groups and are



Landing craft are playing an increasingly important role in this essentially amphibious war. Above are three different types on the beach during the invasion of Kiska. Official U. S. Navy Photo

Above, Landing Craft-Support are speedy armed boats which defend other landing craft against strafing and lay machine gun barrages ahead of invading troops. Official U. S. Navy Photo. Right, an outboard propelled Army small boat, of which there are thousands, up river on a South Pacific island. Signal Corps Photo

Left, a typical scene at a Sicilian port during the later stages of the invasion of the Italian mainland. PCs and LCIs are nested together in the left foreground; landing barges are to the bottom, right. Above, a new use for a rubber boat. This pneumatic raft is equipped with an outboard and loaded with a 1,000 pound bomb. Official U. S. Navy Photo

given the obscure designation of IX. One of the more noteworthy IXs in existence is the famous red-sailed Chinese junk, *Hung-ho*, which toured the major seaports of the United States a few years back for the benefit of Chinese relief.

The task of converting this heterogeneous collection of small craft to Navy use would be a tremendous one in normal times. In war time it was simply impossible to do much more than make a few hurried alterations and send the vessels to sea. With a few exceptions, almost no structural changes were made. Deck winches were removed, fish holds were converted to crew's living quarters, necessary repairs were made and a Navy crew sent aboard. Many vessels which were to carry fresh provisions had to have their refrigerating capacities enlarged. West Coast fishermen gladdened the hearts of Navy men in this respect; their refrigerating plants were more than ample for this type of assignment.

The type and quantity of offensive weapons carried by these ships were in all cases limited by stability requirements rather than by assigned tasks. Even the largest boats carried no more than a 3" or six pounder gun at most. The vast majority of them received only a couple of .30 or .50 caliber machine guns, a Very pistol, a few Springfields and an assortment of pistols. All those assigned coastal convoy and anti-submarine patrol duty carried depth charges in varying quantities. Since all the patrol boats were slow, by Navy standards, the captains were cautioned not to set their charges too shallow, in order to avoid blowing the sterns off their own ships. Nevertheless, a few intrepid skippers did make shallow settings on certain occasions when they were sure they had located a sub. As a result, more than one YP came limping back to port with a damaged stern.

PYs and many of the "Y" type (District craft) are today operating in every theatre of the war except in Africa. You'll find them in Iceland, the British Isles, along both coasts and in the Caribbean, around the Panama Canal, Alaska, the central Pacific Islands, including Hawaii, and in the Solomons. In all these areas, wherever American troops are present, the "Yippies," as they are usually known, will be found. Now that the Navy's own small boat building program is in high gear, with a consequent decrease in the submarine danger, the primary duty of these boats has given way in many cases to every type of auxiliary work. They haul fuel, gas, water, freight, mail, passengers, ammunition, troops, food and prisoners. In addition, they play a vital part in rescue and salvage operations.

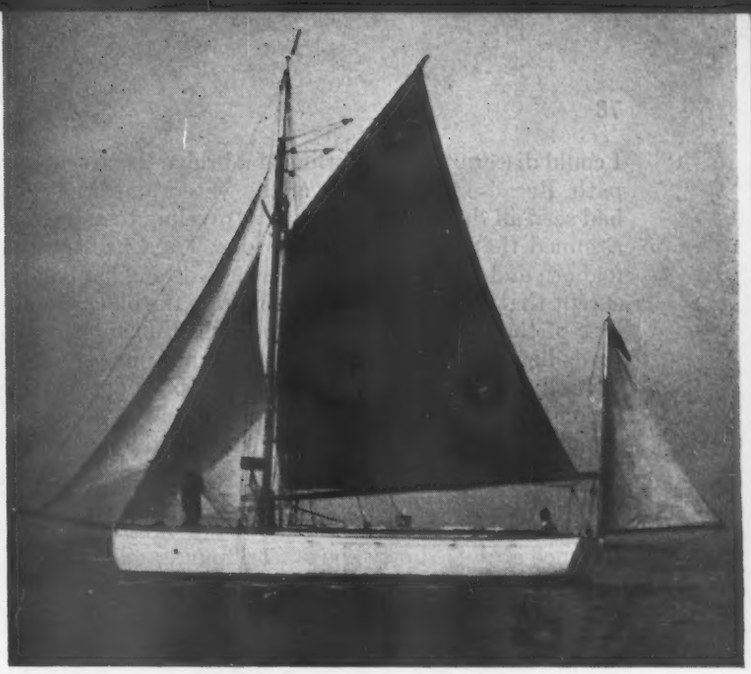
(Continued on page 140)

It is not uncommon for sea conditions to cause landing craft of all sizes to broach to on hitting the shore. Here is a "morning after" scene on an Italian beachhead. An LST is offshore. Signal Corps Photo

A QUIET NIGHT IN HARBOR

What Happened to "Uldra" on a December Night in the Humber

By GEOFFREY OWEN



"Uldra's" arrival in Hull was not impressive. We were not only not noticed — we were ignored, but our brief stay was an adventurous one

THE fact that a seven-ton yawl should arrive off its dreary waterfront on a December afternoon made not the slightest impression upon the busy port of Hull. It was far too actively engaged belching yellow smoke from its factories, sending big freighters out over the brown flood of the Humber, welcoming sleek trawlers home from Bear Island and Icelandic waters, and opening and shutting its lock gates to the coveys of barges bunched together behind their mother tugs. Even the apple-bowed "keels," with their great square sails — reminders of the Vikings — drifting alongside the piles of a wharf, were of more interest than the yacht anchored offshore. No, *Uldra* was not noticed and, what offended more deeply, neither was her skipper.

It was an extremely annoying, and a quite worrying, situation. I had no desire to remain out there in the flood for the night; not with all that hurrying traffic around. But what could I do? With no auxiliary to pop me into safety; no wind to allow me to gamble on a piece of dexterous maneuvering; no way of making a contact with the shore, because my collapsible dinghy had rent its canvas seams and would never have survived the hundred yards to the nearest jetty; I was in what is commonly known as a predicament. You would have thought that all my frantic shouting to each tug that passed, all the running up and down deck, all the wild waving of arms, would have stirred the curiosity of some one. But no, Hull was busy and, besides, what right had a yacht — single-handed at that — to be there in winter?

It did not ease my feelings to be without cigarettes or tobacco, and it helped not one whit for me to read the advertisements for certain brands displayed on a building ashore. Further scrutiny disclosed the fact that the same building was a public house. The thought of a frothy pint of beer, and what I could do to it, drove me on to wilder schemes. I rummaged out my ensign and ran it up to the masthead. Maybe a customs launch would dash out to me. She didn't.

The sun, a mossy red ball skulking behind the pall from Hull's chimneys, was slipping rapidly downward. Within an hour it would be dark. I sat on the cabin top and weighed my chances. A short distance upstream was a small indentation in the long, inhospitable frontage of wharves, and I felt certain that it marked the entrance to a dock; tugs and barges had been bustling in and out all afternoon. If I could but reach the place, I knew I would be saved from the danger of being run down during the night; I might find a quiet corner and lie in peace. But how to cross the oily, four-knot tide without the aid of a breeze or an engine? With a draft of almost six feet, I knew that *Uldra*, once in the grip of that stream, was going to waltz sidewise at a dismaying speed. Could I hope, with the help of my long, unwieldy oar, to propel her across the swift flood in quick enough time to make my objective? I must have dallied a long time because I looked up to discover that the sun had set. This served to prod me into action. I decided to make the gamble.

Laboriously, I brought my anchor aboard. Then, skipping aft to the sweep lying ready in its oarlock, I dug feverishly at the water with it. My frenzied efforts seemed quite inadequate; it is against the law of human possibility to push 33 feet of heavy boat at any speed by an oar. Through my spectacles, smudged with perspiration, I noticed the shore ahead sliding gradually by. My leeway was obviously enormous. I dared not look at the little haven for which I was attempting; I was not too sure of my tenacity in the face of apparent failure. I rowed and rowed and rowed. No Roman whip could have made me row harder than I did on that occasion.

I made it — just! And by "just" I mean that *Uldra's* nose pushed itself against the piles of the wharf at the upstream end of the open basin and, by scampering forward, I was able to claw the ship away from the grasping tide into an area of harmless, swirling eddies. Relaxed, I allowed *Uldra* to be jostled around until we were within reach of a small coastal steamer. A grimy face looked over her side. I was informed that I could not stay there and that my best move was to proceed into a dock that lay hidden away in the hinterland of tall buildings.

Looking in the direction the man pointed, I could see a channel twisting in toward the city, losing itself in the dark shadows of musty warehouses. With the flood tide still running, this would be simple to negotiate. What was not so simple was the navigation necessary to evade a large, three-legged dolphin standing well out in the stream; to round it would mean more Herculean efforts with the oar. The short December twilight had almost finished, and the flickerings of a red kerosene lantern dangling on the side of the dolphin were plainly visible. Lighting my running lights, I hung them up before starting the second round of my flight with the tide.

I was too occupied to see whether my amiable friend on the steamer watched us swoop down on that dolphin and whether he was observant enough to note that the red lantern was no more after we had infamously grazed our way past it. I was *much* too occupied. And I forgot all about the man, even the incident of the lantern vanished from my mind, as I suddenly realized that yet another obstacle lay in our way. Out of the gloom ahead

I could discern the dim outline of a bridge thwarting our path. Because it was low over the water, and because I had seen all those tugs and barges traveling to and fro, I assumed that it was a swing bridge. I reached for the foghorn and blew three lusty blasts. Nothing happened, except that they came back at me from the black emptiness of the buildings around. We sidled on for twenty yards before I blew again. There was not one sign that anybody was aware of my presence. I blew once more, furiously, straining my cheeks in the process. I waited, listening for the bark of a human voice or the low grinding noise that would accompany the opening of the bridge. I listened in vain. Unrewarded, I was forced to drop anchor to prevent *Uldra* drifting into the inanimate nuisance ahead. Slowly she swung round and faced the incoming tide.

My hopes were raised when the red, green and double masthead lights of a tug came into view from the river end of the channel. The tug squawked three times on her siren, received no response from the sleeping bridge and, practically enough, pulled its tow to one side of the channel and tied up. A while later, another tug with a tow came hustling in from the river. She too pierced the quiet with three demanding toots. The bridge remained dormant. This tug, however, pursued her course down the center of the channel, directly toward the anchored *Uldra*. I comforted myself by arguing that the tug skipper knew what he was at. I did not conceive that my running lights, still burning brightly, might be taken by him to be the lights signifying an opened bridge. I merely thought he would judge me an outward bound vessel and glide past to port. When I saw that he was not deviating one fraction from his head-on course, I leaped to my feet and ran forward. He was so close by now that I was able to yell at him. I made it rough because I thought he would understand better. He did. There was a ringing of bells, shouts, engine rumbles, thrashing of water and a passing remark aimed at me. Then he veered off, turned around and headed for the river, disappearing rapidly and completely. So completely that for a moment I was mystified. Suddenly, I realized what had happened, why that tug had been able to slip out of sight so quickly. She had ducked behind her tow which she had left to drift helplessly on, straight for *Uldra*. I looked up at the great bluff bow of a "keel" looming out of the darkness just beyond my bowsprit. I did the only thing I could think of to lessen the inevitable impact. I whipped the chain from around the bitts and let it run.

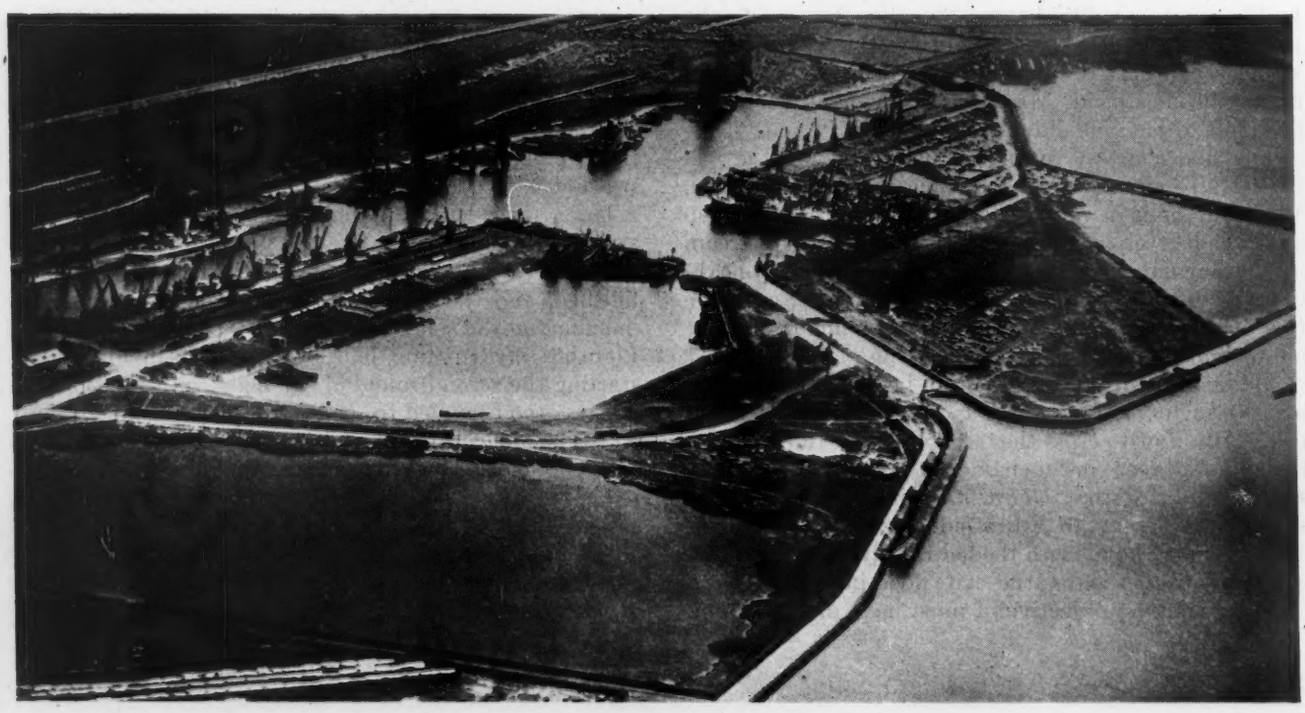
I was thankful afterwards that the "keel" hit *Uldra* absolutely square on the end of the bowsprit; the spar could not have withstood a glancing blow. The crack of a breaking sprit, the splintering of wood, the entanglement of wire that I felt must occur, did not. After the jolt of the collision, the "keel" hovered a moment, indecisively, before scraping down alongside and blundering away into the darkness. I stood on the foredeck bewildered, staring down at a perfectly intact bowsprit. It was not until I examined it more thoroughly next morning that I discovered it three inches farther inboard than before and that the half-inch from fid running through it forward of the bitts had been bent into the shape of a U!

I might have found that out right after the accident had I not been asked irritably from shore whether I wished to pass into the dock. The bridge was open. As I wearily hauled in the long length of chain I had let run, I had to keep assuring the voice of the bridge-keeper that I would not be long. Feeling far from good tempered, I yet had to moderate my replies, fearful lest, after all this turmoil, I would annoy the man into closing his bridge before I had passed through. At last, the hook clanked against the topside. Back to the sweep I went and slowly *Uldra* entered the haven, the haven that had been so hard to win and that I hoped spelled a peaceful night. It gave me Tom, instead.

At our introduction, I could not tell what he looked like. It was pitch black in that tidal dock, a dark, eerie place of slumbering granaries and gaunt warehouses. High overhead, the sky was a dirty pink, the reflected lights of a city that might have been miles away. Except for one man at the entrance to the dock who, having directed me to the unfathomable depths of jet beyond, had now disappeared, I believed myself entirely alone. Dipping the heavy sweep into unseen water, I slowly

(Continued on page 146)

Some of the basins and docks of Hull, the busy port of the Humber River, as seen from the air. Galloway photo



Official U. S. Navy photo

An aircraft carrier's course is necessarily most irregular, as she must maneuver so as to facilitate the handling of her planes.

SPEAKING OF NAVIGATION

It Seems to Come Easier to a Windjammer Sailor

Editor, YACHTING:

The arrival of the boating magazines is the high spot of the month and I must compliment you on the way you are keeping up the quality of YACHTING during these difficult days.

I had to give up my squadron in May and I then joined the carrier in which I am now navigator. You can imagine that I would be pleased with the job as it is closer to things nautical than other departments. The mechanics of navigation in such a big ship are, of course, assisted by numerous gadgets the sailing man never thinks existed. For instance, our DR position can be read off a couple of dials at any time. But such things are a necessity in the type of cruising we do as our track, far from being the straight line one usually associates with large vessels, is often more irregular than that traced by a couple of racing dinks.

I've noted some comment for and against H.O. 214 in YACHTING. I believe that its use is almost universal in the Navy nowadays. We do all our work on plotting sheets so we find the single correction method the easiest. Some have complained of the book's bulk. Surely there is room to stow the volumes required in any boat. (I'm sure there would be in *Sara Reid*.) And I personally work all my sights sitting on the charthouse transom, which is exactly like those on the average yacht. We ordinarily take sights of six stars, comparing readings between myself, the assistant, and the chief until we agree or agree to disagree, by — passing C–W and CE by marking the time with a second-setting watch reading GCT. Ordinarily, the working and plotting by each individual is done in 30 minutes and I then pick the fix from this total of 18 lines. An essential part of this speed is the use of the *Air Almanac*, a publication I haven't seen discussed in your pages but whose advantages are so obvious that there is no comparison. When a quick fix is required, we each take and work two stars — getting a six-star fix in fifteen minutes. Perhaps such speed is of no interest to the average yachtsman but I believe H.O. 214 and the *Air Almanac's* shortness are also freer from possibility of error. Not only are there fewer steps but extracting the wrong (or adjacent) value will give an obviously preposterous result; something that can't be said for other methods.

Our specialty during the daytime is a fix using the sun and Venus, a trick that is easy to do when Venus is at her farthest from the sun. Simply run through H.O. 214 with an assumed position to get an approximate altitude of Venus, set this on the sextant and look on the proper azimuth and there she'll be.

We also have a time saver that could be used by anyone: a table of sextant corrections which is made up for usual height of eye (one column for sun and one for stars), with the correction for each degree. I've never seen this mentioned in anyone's navigation book.

I spend most of my time superintending the tactical handling of the ship. Perhaps it has never occurred to

(Continued on page 154)

HOW TO BUILD A HALF MODEL

Part II—The Model Carried to Completion

By W. H. de FONTAINE

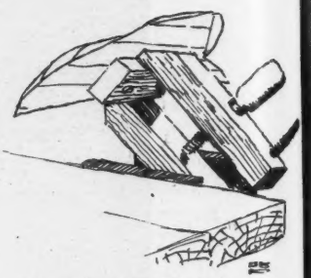
LAST MONTH, I described the necessary preliminaries to the actual shaping of the hull of your half model. This month I shall tell you how to shape and finish it.

I assume that anyone attempting to make a model will have access to some sort of work bench equipped with a vise. This equipment is not absolutely necessary, of course, but it is most helpful and its lack will force the model maker to resort to makeshift methods. If you have the time, and can get the materials, I recommend that you make for yourself a model maker's chisel such as described in *Gadgets & Gilhickies* for April, 1943. This tool will not only make the work of shaping your model easier, but will also be a permanently useful addition to your tool collection.

I have found that holding the model about elbow high (when standing) is the best position, giving one better control over the cutting tool and enabling one to stoop and squint at the form of the hull from time to time, thus saving the necessity of removing it from the vise at frequent intervals. If a parallel clamp is clamped to the holding block and the clamp then placed in the vise, it will raise the model to the desired height and will also enable the model maker to swing the model from side to side as the work progresses, making the work much easier.

In shaping the hull, commence with the midship section and work forward first, and then aft. Also, in shaping the sections, it is well to begin at the rail and work toward the keel. Haste will make waste at this point, for the transverse shaping of the hull requires the greatest care. The removal of too much material will mean that the use of plastic wood or a "dutchman" will have to be resorted to, or, if the damage done is too great, the abandonment of the block and starting all over again.

With a well sharpened chisel, proceed to remove wood carefully at the midship section, fitting the template at frequent intervals as the work progresses and leaving a little excess wood to be removed later with file and garnet paper. When holding templates to the hull for checking, care must be taken that they are held at right angle to the keel, or centerline. Failure to observe this rule will result in distorting the final shape badly, particularly toward the ends.



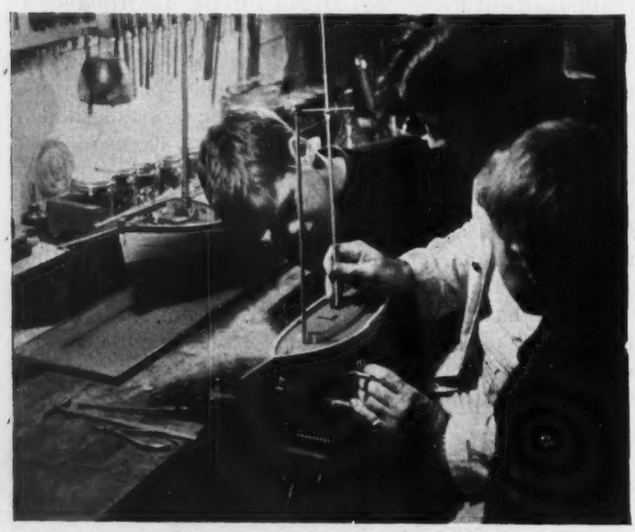
A Convenient Method of Holding a Model for Carving & Painting

After the hull has been roughed out with a chisel, it should be gone over with a small block plane, set to take a very fine cut, and the high spots carefully removed. Continue to check with the templates during this operation. It is at this point that the use of a short flexible spline is indicated. One approximately the length of the model is about right. Such a spline may be made by cutting a straight grained piece of wood to a section of about 3/32" x 3/16". Lay this spline along the hull as though it were a plank and mark carefully the high spots that it touches, moving it from rail to rabbet line slowly and squinting under to see where the light comes through. This, plus the use of the fingers, which should be passed over the model at frequent intervals, will help to assure its fore-and-aft lines being fair. The use of small pieces of broken glass is a helpful dodge. They make excellent scrapers if handled properly, but care must be taken not to apply too much pressure as there is a tendency to scuff up the grain of the wood.

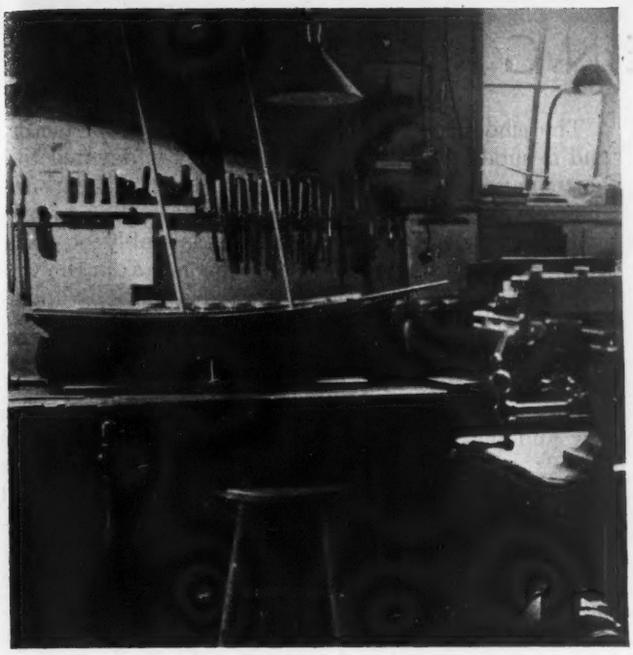
The use of the half round file comes in at the final shaping, too. Its rounded side will be found useful in shaping the hollow parts of the hull, near the keel and at the run, where the reverse curve comes in some boats. The flat side may be used in removing high spots that were discovered with the spline, for smoothing the transom and for putting the final touches on the model's profile. Nice sharp edges where the transom joins the planking, and at the stem, add much to the final appearance of a model and care should be taken to achieve them. A file is the best tool for the purpose.

The final shaping operation is sanding and, for this, the best material to use is garnet paper. It cuts faster and lasts longer than old-fashioned sandpaper. Tear the sheets into quarters and tear some of the quarters in half. These eighths, when folded in half, are just the right size for the final sanding operations. A small piece of thick felt, such as used for pads under typewriters, is useful to wrap the paper around.

When the hull has been shaped to your satisfaction and is sanded smooth, ready for painting, it may be given a coat of thin shellac. This fills the pores of the wood and makes a satisfactory base for the paint that will be applied later. This shellac coat should be rubbed down, either with fine steel wool or 7/0 "wet-or-dry"



As the twig is bent so the tree is inclined. Models always seem to fascinate small boys. Gordon Aymar photo



A corner in the author's model shop. A cozy spot where the smell of wood shavings fills the air. A model of a coasting schooner from drawings by H. I. Chapelle is under construction

sandpaper. In either case, the rubbing should be done very lightly so as not to penetrate through the protective coat of shellac, but simply to smooth it off.

No matter how carefully you wipe off a sanded surface with a dry cloth, you will never succeed in getting it really free of fine dust. Professional wood finishers use a wiping cloth made from a piece of old, and well washed cotton or linen cloth. A satisfactory size for model work is about 18″ square. Using about a cupful of turps with 10 or 15 drops of varnish added and stirred in, saturate the cloth in the liquid and wring it out as dry as possible, so that it is barely damp to the touch. Next, fold the cloth so that none of the rough edges are exposed and it makes a pad about the size of the palm of your hand. When not in use, this cloth should be carefully stored in a dust free and airtight container. A straight-sided bottle such as Alka Seltzer tablets are sold in is ideal for the purpose. Such a cloth will serve for a number of years without losing its effectiveness and is well worth the trouble of preparing. It will be found useful, also, if you are given to refinishing your old furniture. It should be used just before applying each coat of paint.

If you did not include the height of the rail in the block for the model, it will be necessary to fit it now. It should be made of a straight grained piece that will bend without breaking. A close grained wood like white holly, boxwood or cherry is fine for this purpose but, if not available, anything at hand will have to suffice.This strip will be fastened down to the deck with the smallest fastenings you can find. I use "lills," which are tiny pins about ⅜″ long and very small in diameter. They may usually be purchased in either stationery shops or in the notion departments of the larger department stores. Brass lills are to be preferred. It will be necessary to drill small holes to take the fastenings, otherwise the wood would be sure to split. Before attempting to assemble the rail with the hull, drill all the holes, and insert the lills, ready for driving. Holes should be about 1″ apart. The ends of the rail should be allowed to protrude both forward and aft, to be trimmed off as required after secured in position. Just before applying the rail, I always give its bottom a coat of John Collins Cement (from Woolworth's). I also apply the cement to the deck where the rail will fit. Then proceed, without delay, to drive home the fastenings. The little fashion piece that usually fits around the stern of a model is fitted next. The inner edge should be finished before fastening but the outer side may be made oversize to allow for shaping to the required contour after the cement has set. This piece should also be fastened down with lills. If the end of the fastenings protrude through the transom, by mistake, simply cut off and file flush with the surface. The final shaping of this fashion piece is best done with a file.

The next operation is to apply the rail cap. First, the heads of the lills in the rail are filed flush after which the cap, which should be made from very thin material, may be fitted. Care should be taken that the cap is kept to the proper scale, as it will spoil the whole appearance of the model, no matter how carefully formed, if it is too thick. It is generally better to cut these pieces to shape, rather than trying to bend them. The inside edges should be trimmed to the required curvature before fastening but the outside edge may be trimmed later, as in the case of the fashion piece. The cap should be fastened and cemented in the same manner as the rail, the trimming of the outside edge being left until the cement has set. A file is best for this purpose.

After the rail is completed, you are ready to start the painting. Let us assume that she has black topsides, a white boot-top and a bronze bottom. It will be necessary to finish her all over (except rail and deck) with white enamel. Be sure that the can of enamel you are going to use is not too old, as sometimes old paint dries too slowly or not at all. If in doubt, put a coat on another piece of wood to see how well it works. It is best, for model purposes, to buy your paints and enamels in the smallest cans you can get as these have less tendency to dry out between jobs — also there is less loss in case they should become useless.

Before commencing to paint, it is advisable to keep the dust in your shop to a minimum. Do not stir it up by sweeping, sanding, etc. Before beginning to paint, more particular workers sometimes dampen the floors with a spray of water in order to settle the dust. It is impossible to do good painting with poor or dirty brushes. The best brushes that I have ever found for model work are red sable lettering brushes. They may be had in sizes ranging from ⅛″ to ¾″ in width and come to a chisel end. Such brushes should be rinsed out in clean turps after each using and then thoroughly washed with soap and cold water, making a liberal lather and squeezing out all remaining paint with the fingers. Never let your small brushes lay over from day to day in turps or water, if you expect to do a good job of finishing.

Enamel as it comes in the usual can is generally just a little too thick for model work and it is advisable, if it

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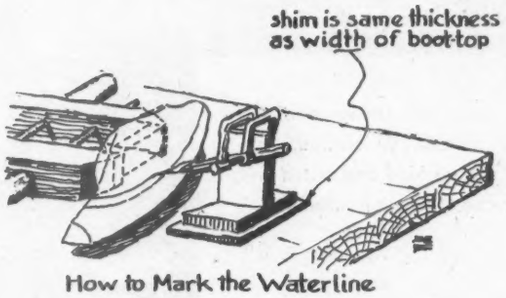

How to Mark the Waterline

PACKARD'S PT ENGINE SCHOOL

THE Packard Marine Engine School started October 10, 1940, to train Navy personnel in the operation and maintenance of Packard marine engines for PT boats. It was the first school of its type in the Detroit area, and the first of a military nature to be set up within the automotive industry. With the expansion of the PT engine into Army rescue boats, the school has numbered many a soldier among its ranks. Long before Pearl Harbor, its training fame spread into the Packard shops. Soon motor car machinists and assemblers asked permission to sit in with the naval students and improve their own mechanical knowledge by the carefully planned work that was training engine experts who, later, were to make a name for themselves in PT boats in the Pacific.

Since its inception, the school has graduated better than 1100 enginemen for the U. S. Navy, U. S. Army, Allied navies, and scores from the ranks of Packard war workers. "Alumni" are serving with distinction on many fronts. In fact, of the 85 heroes listed in YACHTING's recent "PT Roll of Honor," *nearly a third* are graduates! Such of these names as Akers, Cox and Searles learned engine procedure at this Packard institution. It was "class 13" of the school which numbered Lieutenant Cox. The fact that his listing in the Honor Roll shows the greatest number of merit awards quite disproves that old "13" superstition.

To become a candidate for enrollment involves first an Army or Navy "screening" which selects men for their mechanical aptitude as engine operators and servicemen. They are thus sorted at training centers throughout the country and come from all points of the compass. An eight weeks' course acquaints them with every phase of the Packard marine engine. Instruction is divided into two parts: One covers details of engine construction, operation, minor inspection and trouble shooting, and the other includes complete engine maintenance and overhaul, using base maintenance tools and precision inspection. The course combines theory with practice. Classroom instruction is supplemented by actual engine work in the shops and in the school rooms.

The school now occupies an entire wing of the factory and is subdivided into bays. Each bay is devoted to a particular engine assembly — crankcase, block, carburetion, ignition, etc. Students progress from bay to bay, and their final job is the complete assembly or disassembly of an entire engine. What this means in the way of mechanical skill is better grasped when it is understood that a Packard marine engine has upwards of 10,000 parts. In an entire Packard car — body, chassis and engine — there are only 7,140.

The school's contribution to the rapid growth of a new and potent development in sea warfare won the Navy's commendation, which in 1943 classified the school as one of its key instruction centers and placed naval officers in charge. Life aboard the *U. S. S. Instruction*, as the school is known, resembles that of any well run trade school. Students are quartered at the Naval Armory, on the Detroit River, a mile away. Promptly before whistle-blow in the morning, a truck load of fatigue-clad sailors enters the factory gates. In orderly fashion, they march in and start the day's instruction.

With the school spotted off the factory's beaten path, not even company employees know what goes on behind its closed doors. Each day, more than 100 officers and men pass through them. Besides Navy sailors and Army soldiers, they include men from the navies of Britain, Canada, Australia and the Netherlands. Fame of the school is international and many a student has girdled half the globe to attend.

The idea for this engine course stems from the idea of the engine itself. This grew out of past experience, dating back a quarter-century, when Packard became the Navy's largest supplier of liquid-cooled aircraft engines. After World War I, work continued in the field of adapting these aircraft fundamentals to marine engine use. The result was that in mid-1939, when naval thoughts were turning to development of a small and swift surface torpedo boat as a new auxiliary to its sea forces, Packard was ready with a marine engine built to

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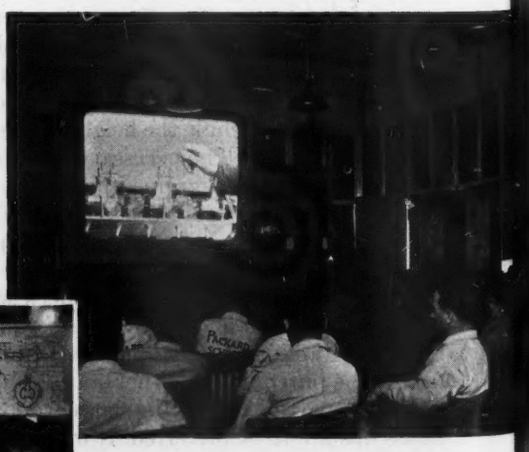
Left, the Royal Canadian Navy, the United States Army and the United States Navy work side by side at the Packard School. The last stage of final instruction includes critical settings of the engine on the dynamometer stand



Right, each sub-assembly of the engine is carefully studied, torn down, reassembled and tested before another unit is taken up

Above, a visual training sound slide film precedes class instruction, after which the men are ready to tackle the actual problems in the shop

THE U. S. POWER SQUADRONS IN WORLD WAR II

By WILLIAM L. SAYERS, N

Chief Commander, USPS

PEARL HARBOR tells many stories; one of them is of the value of training. Time and effort spent on training — on learning — can and do pay dividends. With the belief that the USPS instruction courses could be as valuable to the war effort as they had proven to be to the nation's yachtsmen, a telegram was sent to the President on the day following that "black Sunday," pledging the Squadron's support and offering its services for any duty that might be assigned. The following reply, signed by the President, was received within twenty-four hours: "I have received your telegram transmitted through Commander Middleton pledging the support of the entire membership of the United States Power Squadrons. This spirit of loyalty is deeply gratifying and I want all of you to know that I appreciate it."

It is with considerable pride that the United States Power Squadrons have acted on requests from the Armed Forces for assistance in training. Of the three major fields in which the Squadrons have tried to do their share in prosecuting World War II, training in navigation and seamanship is of peculiar interest. One of our objects is "to encourage the study of the science of navigation;" another is "to stimulate interest in activities which will tend to the upbuilding of our Navy, Coast Guard and Merchant Marine." As a hobby, often only from the joy of learning, our members have for more than twenty-five years regularly conducted classes in piloting, seamanship, navigation and kindred subjects.

In the first World War, those of us who had to stay at home had the opportunity of applying our experience and nautical knowledge in the instruction of men who were in the Service or who contemplated entering it. Four nautical schools were operated in New York City. Others in Boston and Detroit, in New Haven and Washington also trained men; and trained them well. It is not surprising, then, that the Squadrons initiated similar work in the early months of the present war. Our regular classes were opened to Service personnel before Pearl Harbor and, at its September 1941 meeting, the Governing Board approved appointment of a War Course Committee. Squadron members offered their services as instructors, courses were planned, and in November, following conferences with the Commandant of the Third Naval District, a class in Celestial Navigation was inaugurated in New York. A few days later a class in Piloting began operation. These courses were made available without charge to all officers who could attend.

In December, the Wilmington (Delaware) Squadron had completed its plans and, under the auspices of the Director of Training, Fourth Naval District, started its special classes for Navy and Coast Guard personnel and approved officer-candidates. These classes have continued, week in and week out, ever since. Some have been designed as quick refresher courses in navigation, piloting or seamanship; others have been more extensive. The sixth group of officers is now busy with the last part of the work in celestial navigation and the seventh class is scheduled to open in March. This Squadron has received two letters of commendation from the Navy for its work.

The Delaware River Squadron, at Philadelphia, has operated courses in piloting, chart construction, traverse sailing and celestial navigation under the auspices of the Director of Training, Fourth Naval District. The class meets twice each week in the Staff Headquarters building of the District with special sessions on celestial, including star identification, held at the Fels Planetarium. Philadelphia and Wilmington have also conducted short training cruises afloat for their students.

These activities are merely illustrative of what all the Squadrons are doing. Miami, Saginaw, New Orleans, Seattle, Duluth, Washington, Boston, Grand Rapids, Baltimore: the listing could go on and on. On the West Coast, for example, the several Squadrons have worked closely with the Coast Guard in furnishing instructors ad course material for training members of the Temporary Reserve and Auxiliary as well as for training regular personnel. Baltimore had some 500 Coast Guardsmen enrolled in one of its classes; their senior instructor was commissioned in the Coast

(Continued on page 152)

Countless are the men now in Service who received their preliminary training at Power Squadron classes. Official U. S. Coast Guard Photo

Under the Lee of the Longboat.

by Spun Yarn

A HAPPY NEW YEAR to you, and may it include no further ravages of that old demon Prohibition. Insidiously, since I last mentioned it in these columns, the forces of evil have been closing in on us. We have seen the diversion of all manufactured alcohol to industrial purposes (last war the gag was that the grain was needed for hogs and cattle); we have seen whiskey reserves in wet states drained to quench the thirst of residents of dry states; and we have seen the pyramiding of liquor taxes on existing stocks to such a height that the criminal element can't afford not to start bootlegging. And, if we don't watch out, we'll win the war from the jerryjaps only to lose it to the Do-Gooders. I keep on telling you.

I'm glad to see from a clipping from *The Miami Herald* sent in by Sandy Moffat that war does not necessarily halt the impetuous progress of sailboat architecture. Old-fashioned designers like John Alden and Olin Stephens may turn aside to devise salvage vessels and sub-chasers, but into their place steps Lieut. W. D. Pawley, Jr., of the Army Air Force, with a genius consecrated to the design of a sliding keel sail boat. I once almost designed a schooner with a balsa wood keel to keep her afloat if she pitchpoled — as, indeed, why shouldn't she? — but my inspiration stopped short of a keel that can be shifted aft to keep the bow from rooting. I see, however, that I must quote from the lucid description written by one John Pennekamp to let you into the secret.

"It's an unusual contrivance, 16 feet long, nearly eight feet wide at its center, and with what sailing adherents know as a moth type bow and runabout stern. In layman language, that means, roughly, that the front is blunt, as is the back, with the back wider than the front."

You follow us, I'm sure. Other peculiarities of its design, says Mr. Pennekamp — and I quote — "are that the 24-foot mast will rise from the stern and the keel will not be fixed. Since it will have a keel, there will be no centerboard, common to most small sailing craft. Lieutenant Pawley believes that it is possible to build a sailboat which can go as fast as a speed boat, and the one under construction is his first experiment in the direction of finding this out."

There we have the intrinsic principle. But let us get on with the details of design. "The mainsail or forward sail, of Pawley's boat — it will have two sails — will be fast to the nose of the boat riding a heavy wire stay to the head of the mast with the operator in control of the remaining tip." I thought at first that the operator of this breathtaking craft would have to stay at the head of the mast to control the sail's remaining tip but, on second reading, I see that this was merely an incorrect association of ideas. Lieut. Pawley has simply got to be down below to shift the keel.

"He has stepped his mast near the stern for the purpose of aiding the lifting powers of the jib-mainsail. The aft sail, riding the mast and boom, will, in combination with the mainsail, change the design of sailing forces (horsepower), Pawley believes, in the direction of higher speed. For the same reasons, he abandoned the centerboard in favor of a shifting keel, since the centerboard and its case would have to be in a fixed position, and it may prove that the keel can be moved nearer the stern, thus aiding the forward lift."

And it may not. But you see how wonderful the epochal design is, and how clearly Mr. Pennekamp has described it. The mainsail, or forward sail (which has a lifting angle of 43°) will lift the blunt front of the boat, and the keel will depress the back. The boat will go like crazy, and Lieut. Pawley will have licked the gasoline shortage and rocketed all the old line designers into oblivion. I wish I could be at hand for the trial trip.

Yes, and nautical language is generally effervescent now that Bill Taylor's restraining influence has been removed from the press by the cruel exigencies of war. From his old sheet, *The New York Herald Tribune*, comes the following lilting pen picture of Winslow Homer's painting "Breezing Up." "A small sail boat

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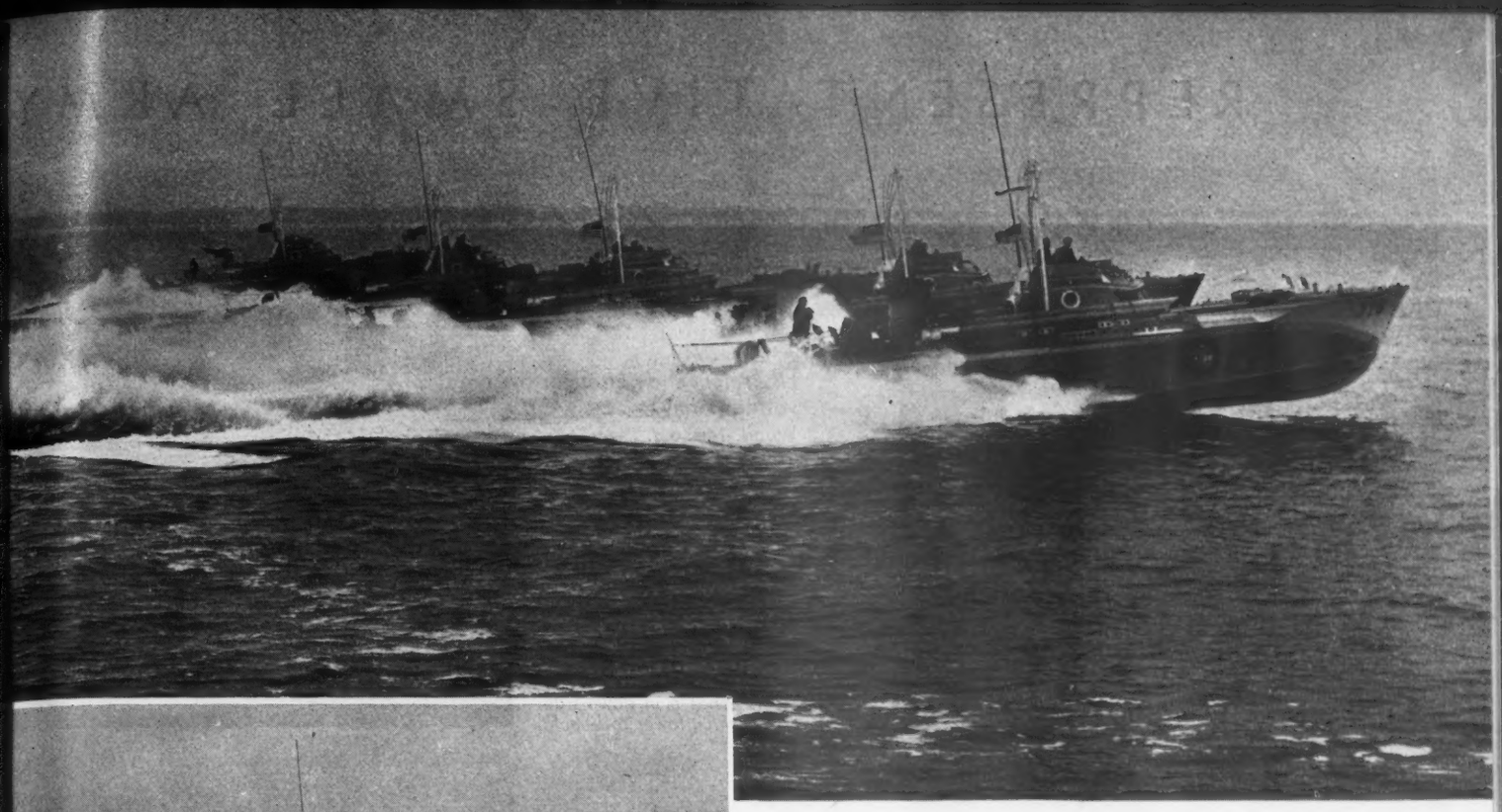
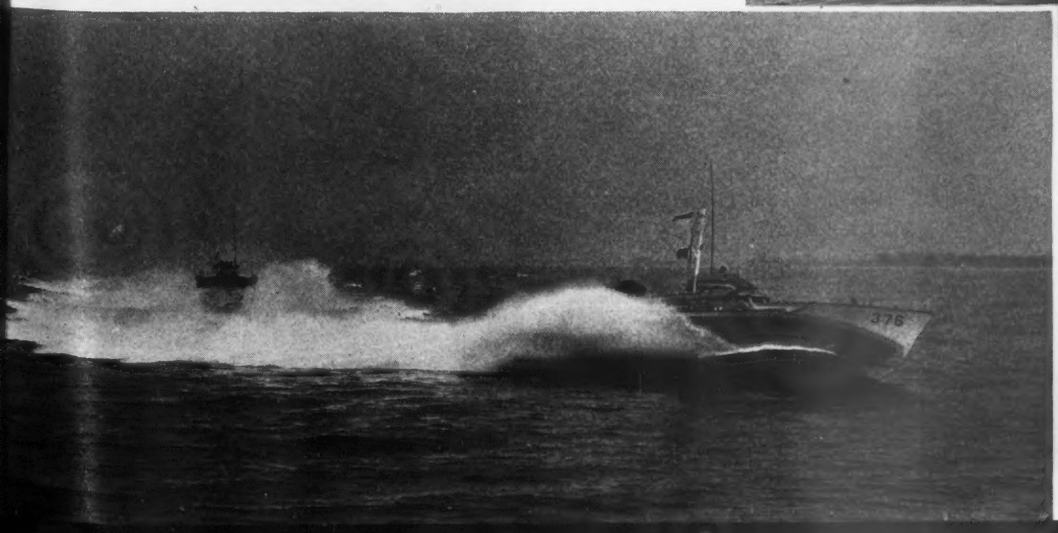


VOSPERS STEP OUT

An impressive fleet of Vosper motor torpedo boats, constructed by the Annapolis Yacht Yard for various Lend-Lease requirements, were recently put through their paces on the Chesapeake. Fast, hard-hitting and wondrously compact, they demonstrated the amazing versatility of these small, high-speed warcraft. Capable of better than 40 knots, and armed with both torpedo tubes and a variety of dual purpose guns, they are pugnacious fighters

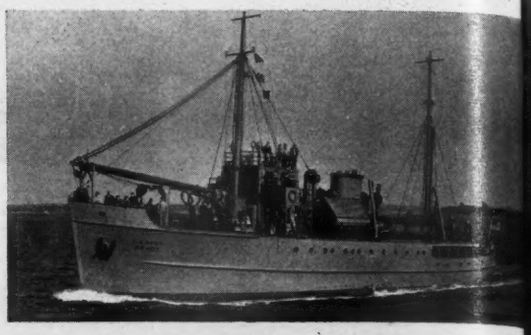
To be effective, a motor torpedo boat must be the ultimate in nautical craftsmanship. She must be designed and constructed to be fast, maneuverable, extremely sturdy and essentially seaworthy



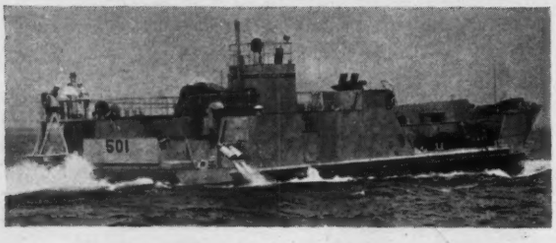
Rosenfeld Photos

REPRESENTATIVE SMALL ARMY NA

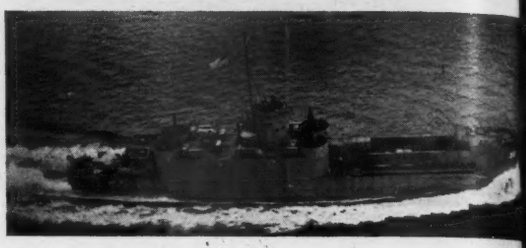
"Madrona." Cutter. (Coast Guard)
Steel. 180' o.a. Numerous dual-purpose and A.A. guns. Depth charge throwers.



FP. Freight and passenger vessel. (Army)
Wood. 140' o.a. Diesel.



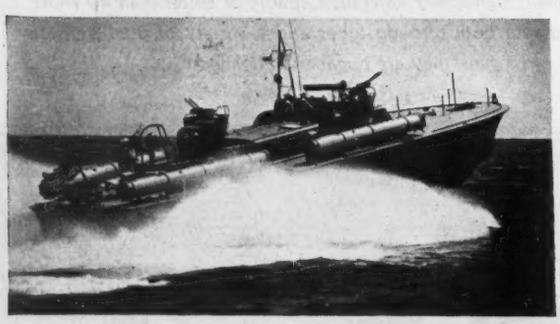
LCT. Landing craft, tank. (Navy)
Steel. Type 6, a modification of earlier models.



LCI. (L) Landing craft, infantry. (Navy)
Steel. Lands men down side ramps which lower to beach.

F. Freight vessel. (Army)
Steel. 99' o.a. Diesel.

APc. Coastal transport. (Navy)
Wood. 103' o.a. 245 tons. Diesel.



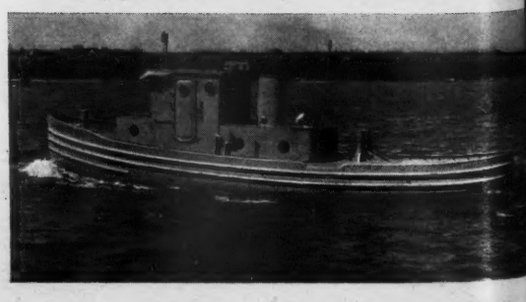
PT. Motor torpedo boat. (Navy)
(Elco type.) Wood. Gas. A.A. guns, two or four torpedo tubes. Depth charges.

PT. Motor torpedo boat. (Navy)
(Higgins type.) Wood. Gas. A.A. guns, two or four torpedo tubes. Depth charges.

Aircraft rescue vessel. (Navy)
Wood. 63' o.a. Gas. Numerous A.A. guns.

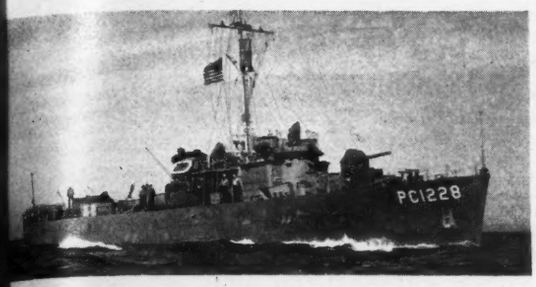
T. Freight boat. (Army)
Wood. 65' o.a. Diesel.

MTL. Tow boat. (Army)
Wood. 46' o.a. Gas or Diesel.



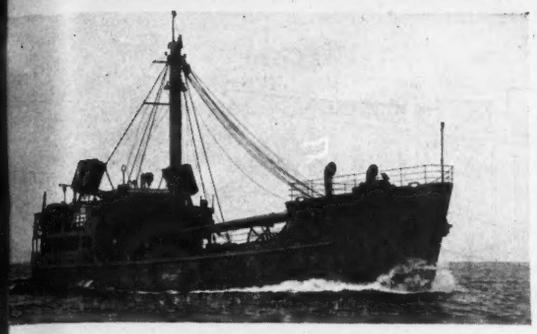
ST. Motor tender. (Army)
Steel. 45' o.a. Diesel.

NAVY & COAST GUARD WARCRAFT



PC. Submarine chaser. (Navy)
Steel. 173' o.a. Diesel. Dual-purpose and A.A. guns. Depth charge throwers.

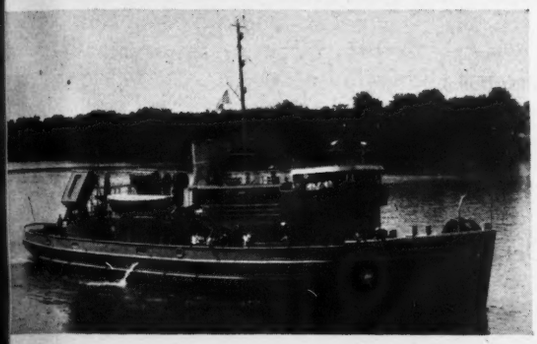
PCS. Subchaser. (Navy)
Wood. 136' o.a. Diesel. Dual-purpose and A.A. guns. Depth charge throwers.



H. Aircraft salvage vessel (Retriever type). (Army)
Steel. 150' o.a. Diesel.

Aircraft rescue boat. (Army)
Wood. 85' o.a. Gas. Numerous A.A. guns.

Eureka "Explorer" boat. (Army)
Wood. 27' o.a. Gas.

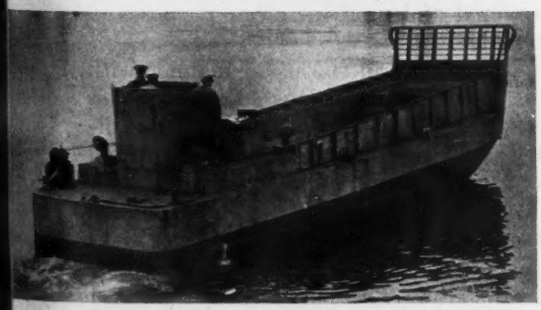


LT. Ocean-going tug. (Army)
Steel. 123' o.a. Diesel.

LCVP. Landing craft. (Navy)
Steel. 36' o.a. Diesel.

Plane personnel boat. (Navy)
Wood. 24' o.a. Gas.

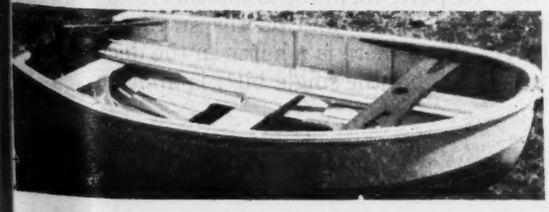
LCP (R). Landing craft. (Navy)
Wood. 36' o.a. Diesel.



LCM (3). Landing craft. (Navy)
Steel. 50' o.a. Diesel.

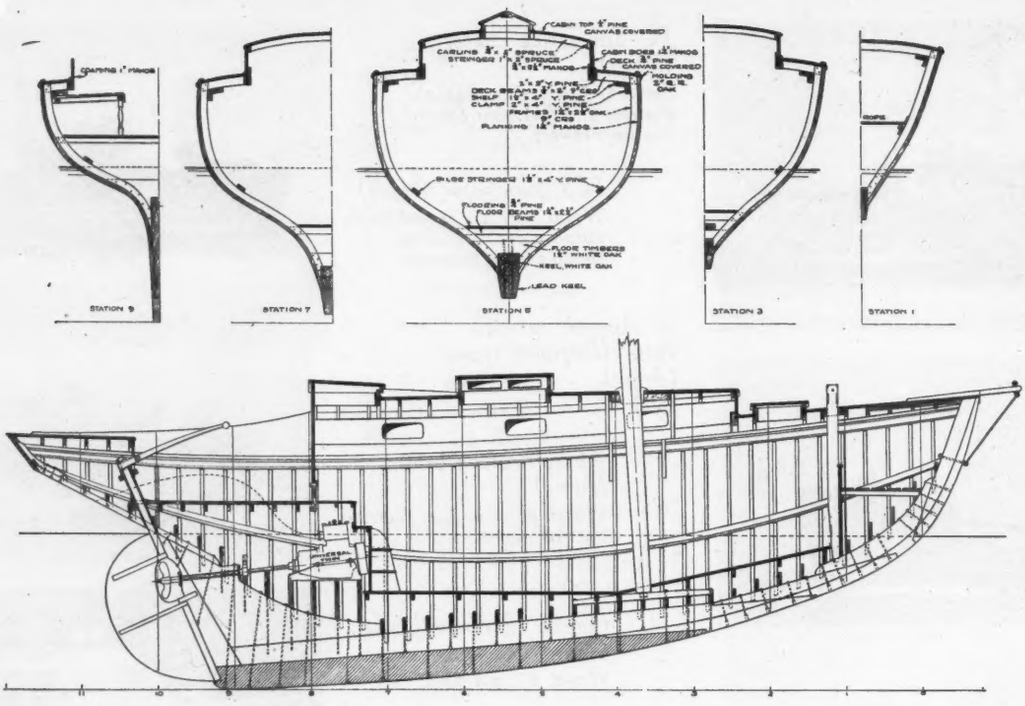
Plane retrieving yawl. (Army)
Wood. 24' o.a. Gas.

Utility boat. (Army)
Wood. 40' o.a. Gas.



Dyer Dhow. (Navy)
Wood. Sailing models used on SCs, rowing models on PTs.

Hydrolite Dinghy. (Navy)
Molded plywood. Used on PTs.



Inboard profile and typical sections, showing the construction

A SMALL POST-WAR CRUISING CUTTER

Part II — Cabin Accommodations and Details

By WILLIAM F. CROSBY

LET'S GO below now and take a look around. The motor is under a box which forms part of the steps leading below. On the port side, just as we step inside, there is a narrow locker where we can hang wet clothes, oilers and so on. The steps themselves are steep because this is a small boat and we don't want to take up a lot of room which might be used otherwise. Of course, the entire structure over the motor may be removed if and when it is necessary to give the engine a going over.

On the starboard side, alongside the steps, is the ice box, opening from the top so that it won't spill its contents all over the cabin floor every time it is opened. The ice will take up about half of this compartment and the other half will be storage for food. Just forward of the ice box is the stove. It is set in a niche in the table top which is lined with Monel or similar material. There is a locker under the stove. It will be easy to have a top hinged so that when the stove is not in use the entire space may be covered and used for other purposes — perhaps a chart table.

The main cabin, looking aft

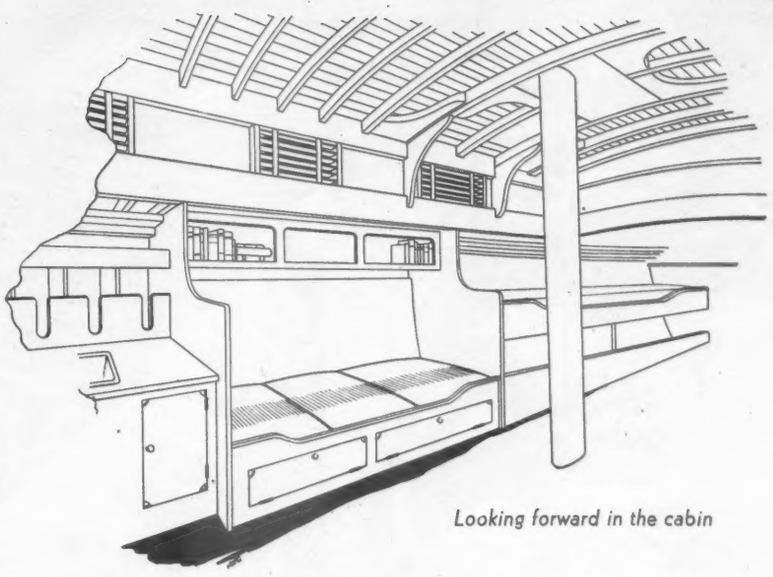
The port side is arranged in the usual manner with dresser, sink, dish racks and various lockers. Under the dresser is locker space. The companion hatch, directly overhead, should give plenty of ventilation and allow hot air from the stove to pass up and out.

Forward of the galley comes the main cabin. There are two regulation 6′ 6″ berths with book racks or lockers above them and outboard under the deck. A skylight gives light and air below. The berths are separated from the galley by partial bulkheads and at the forward end there are also partial bulkheads. The mast comes just about opposite the forward ends of the berths.

On the starboard side is a small yacht toilet, set on a raised platform to give more space for piping and so on. It might have been closed in but a curtain may be arranged across the boat forward of the mast to give a certain amount of privacy. The cabin trunk extends forward of all this. To port, forward, is another 6′ 6″ berth with open space under it, and on the starboard side there are shelves. Then there is a hatch in the deck overhead and, just forward of the single bitt, is another

partial bulkhead with a platform on forward of it where anchor rode and other gear may be stowed. A real attempt has been made to keep the entire interior of the boat open and well ventilated. The plywood backs of the berths are stopped a couple of inches below the clamp to give full ventilation to the space between planking and ceiling. Note that the corners of each locker door are sniped off to allow air to circulate. The cabin is virtually wide open from end to end; this should insure a sweet boat at all times.

Cabin windows would be the usual standard article but both windows and skylights would be glazed with Plexiglas or similar material. This will not break and, if taken care of, will last forever. It may get scratched but, if it does, by the time the boat is built, you will probably be able to buy all of this material you want and a replacement would be no trouble.



Looking forward in the cabin

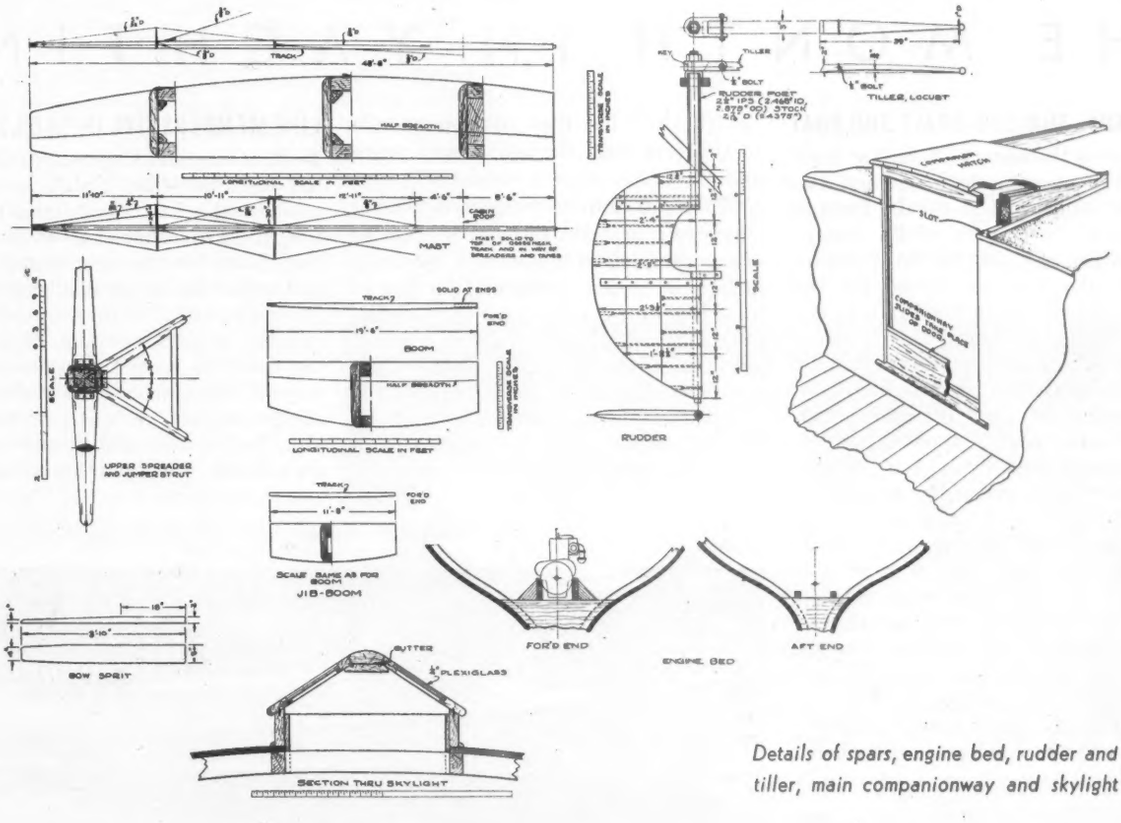
Waterproof plywood could be used extensively for the interior joinerwork and there is no reason why we could not make all the lockers, the ice box, berths and so on from this material. Probably you will be able to buy plywood of mahogany or some other attractive wood. This, if finished off properly, would give an interior that would really be worth seeing. The edges of the plywood, where exposed, as on the partial bulkheads, should be covered with a mahogany molding.

The headroom in the main part of the cabin runs from 6′ 0″ to 6′ 2″ under the carlines. From just abaft the mast, the cabin floor slopes uphill and, at the bulkhead of the rope locker, the headroom is just a little over four feet.

The mast passes through the cabin roof. This arrangement is supposed to be weak but, if the house is properly reinforced with hanging knees, with lodging knees and a stout partner plank, there is no reason why any difficulty should be experienced. After all, we don't expect to use this boat for long ocean cruises or races and the construction shown will undoubtedly take care of anything that we may encounter in the way of weather. The lower ends of the shrouds would, of course, be secured to heavy metal strapping which runs down the inside of the planking, clear to the keel.

Some objection may be made to the little bowsprit. Actually, any man who has ever cruised with one of these for a shipmate will swear that it is probably the greatest thing on the boat. On one side, or both, will be regulation galvanized iron roller chocks through which will be rove your anchor rode or mooring line. If you stop somewhere to fish or swim, you will find it a simple matter to pick up the hook and at the same time keep

(Continued on page 162)



Details of spars, engine bed, rudder and tiller, main companionway and skylight

Spring, and a young girl's fancy. Aboard E. P. Langworthy's ketch "Widgeon." Tex Photo

THE MONTH IN YACHTING

AN UNUSUAL SHALLOW DRAFT TUG BOAT

▶ *Plancor* is the name of a shallow draft tug boat of unusual characteristics. Designed by William Atkin for the Defense Plant Corp., on account of the George D. Emery Co., and built by the Wareham Shipyard, she was constructed for the purpose of towing balsa wood rafts in the shallow rivers of Ecuador.

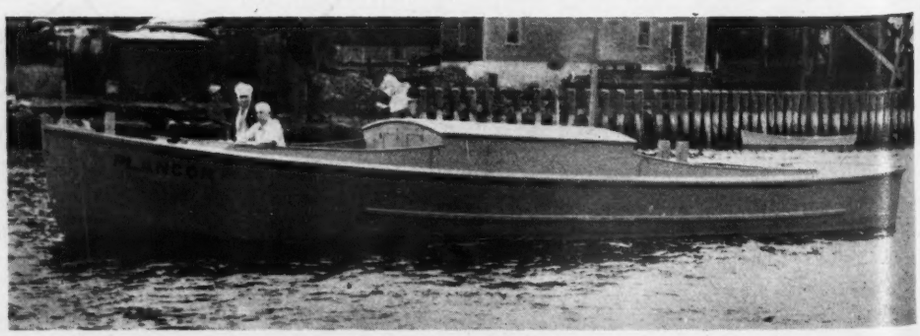
Plancor is both husky and heavy. With an over all length of 40′, a waterline of 39′ and a beam of 10′ 5½″, her draft is but 14½″. Displacement is approximately 8 tons. Propulsion is by a four-cylinder Caterpillar Diesel, giving her a speed of 12.7 miles per hour in deep water, and considerably better than this in a depth of less than two feet. The hull is not the tunnel stern type which is usually designed for shallow water service but is a combination of a bottom such as was formerly found on an old-fashioned Seabright skiff with box deadwood, and the topsides of a V-bottom model. As a result, both the propeller and the rudder are completely protected.

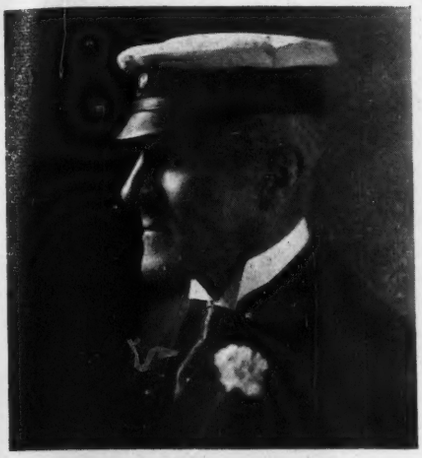
Mr. Atkin has been developing hulls of this type over the last twenty years, and they have proven consistently successful. Such hulls have shown as little as 20 per cent propeller slip and are capable of speeds up to 30 m.p.h. with relatively little power. Since designing the first of these boats for the Gordon Boat Building Company in 1921, Mr. Atkin has turned out many models of various sizes, including one which Dr. L. M. Waugh, of the New York Athletic Club, took to Alaska for exploration work in behalf of the Public Health Service.

LIFE MEMBERSHIPS IN THE I.S.C.Y.R.A.

▶ The Governing Committee of the International Star Class Y.R.A. has recently established a Life Membership classification, open to all members in the association. Dues for the membership are $50 and entitle the holder to all regular benefits and he will at all times be considered a member in good standing. It is pointed out that this special classification in no way infringes upon Fleet rights. To be eligible to race, represent or hold office in a Fleet, a life member must pay Fleet dues, if any, like any other member.

An unusual tug boat from designs by William Atkin and built by the Wareham Shipyard





SAMUEL DAUCHY

▶ It was with great regret that yachtsmen on both the Pacific and Atlantic Coasts, as well as those of the Great Lakes, learned of the death last month of Samuel Dauchy. He passed away at his home in San Diego on November 19th, after a long illness. He was seventy-eight years of age. Active for many years in the sport of which he was so fond, he was not only a keen racing sailor, having owned many yachts in numerous racing classes, but he was always interested in, and working for, any movement looking towards the betterment and promotion of the sport of yachting.

Active in the formation, and for many years a member of the Executive Board of the North American Yacht Racing Union, Mr. Dauchy did much to aid the growth of that national organization on the West Coast, where he had made his home for the past fifteen years or so. Prior to that, he sailed, during the summers, chiefly on Lake Michigan where, throughout the 1920's, he was an enthusiastic promoter of the R Class of 20-raters, owning variously the *Maia*, *Sari*, *Katia*, and *Nancy* (which was built for him). While living in Chicago, he served for many years on the Council of the Yacht Racing Union of the Great Lakes, and in 1921, as Commodore of the Lake Michigan Yachting Association.

Transferring his sailing activity to the West Coast in the early '30's, Samuel Dauchy was active there in promoting several classes, among them the Pacific Coast One-Design Class, known as the PC's, and he owned and sailed the *Varya* in that class until his health prevented, some few years ago. He also owned and sailed the Class R *Maribel* (formerly *Alert III*) on the Coast before going in for the PC Class.

Always public spirited, always helpful and generous of his time and experience, his influence on yachting was great and always for the best. He was one of that highly appreciated group of yachtsmen that appears in nearly every generation who give to the sport they love even more than they take from it in pleasure and experience. He will be missed by a host of shipmates and admirers.

Samuel Dauchy leaves his wife, Mrs. Marion Sturges Dauchy, a son Philip Dauchy and a daughter, Mrs. Thomas P. Faulconer.

INTERNATIONAL STAR CLASS Y.R.A. ELECTS

▶ Results of the fifth world-wide direct election of Association and District Officers by mail voting were tabulated early in November and have recently been announced.

They are:

President, George W. Elder; first vice president, Adrian Iselin; second vice president, Carlos de Cardenas; international secretary, Paul H. Smart; international treasurer, Harold C. Halstead.

District officers are: No. 1. Secretary, Homer M. Clark; asst. secretary, Joseph C. Smyth; No. 2. Secretary, Horace G. Brown; asst. secretary, William H. Crouse; No. 3. Secretary, J. B. Cleary; asst. secretary, Douglas Drennan; No. 4. Secretary, Harry Nye; asst. secretary, A. F. Wakefield; No. 5. Secretary, W. R. Severance, Jr.; asst. secretary, Robert J. White; No. 6. Secretary, George Parsons; asst. secretary, H. E. Wylie; No. 7. Secretary, Chester Crebbs; asst. secretary, R. T. Symonette; No. 8. Secretary, H. W. B. White, asst. secretary, John F. Child, Jr.; No. 12. Secretary, Cebern Lee; assistant secretary, Clifton H. Baker.

NEW OFFICERS ELECTED

▶ At the annual meeting of the Chicago Corinthian Yacht Club, the following officers and directors were elected for a one-year term: Commodore, Harold Hillebrand; vice commodore, William Wingard, rear commodore, William Fisher; secretary-treasurer, H. F. MacNeil; directors, Walter Wills and Dr. H. S. Bayless.

Recently elected officers of the Cambridge Yacht Club, Cambridge, Md., were: Commodore, Henry L. Johnson; vice commodore, Granville S. LeCompte, Jr.; rear commodore, James C. Johnson; secretary, John H. Cosby; treasurer, Howard V. Simmons.

CAPTAIN STEPHEN S. YEANDLE

▶ American yachtsmen lost both a staunch friend and a shipmate in the passing of Captain Stephen S. "Steve" Yeandle, USCG, who for many years had been a familiar figure in national yachting circles. At the time of his death, late in November, he was Senior Coast Guard Officer of the Ninth Naval District and was stationed at St. Louis.

Graduating from the Coast Guard Academy in 1911, Captain Yeandle had a long and active career, including service in World War I. He had served at sea on almost every class of Coast Guard vessel and had seen duty in many theatres of operations. In 1911, he was awarded the Congressional Gold Lifesaving Medal for his participation in the saving of survivors of the steamer *Lexington*. Some years later, when serving on the cutter *Tahoma*, she was wrecked in the Aleutians, and he navigated one of the ship's life boats on the long passage to the island of Agattu. After the Armistice, he served as division commander of a Coast Guard destroyer force. Some years later, he was appointed Intelligence Officer for the Atlantic Coast area, and took part in numerous encounters with rum runners. Later, after again holding various sea commands, he served as Captain of the Port at Norfolk, Va., and later at Hampton Roads, Va. He was transferred to St. Louis on July 4th, 1941.

63' Navy rescue boats, built by Stephens Brothers and powered by Hall-Scott

Captain Yeandle was a member of numerous yachting organizations, including the U. S. Power Squadrons, The Propellor Club, The Corinthians and the Maryland and St. Petersburg Yacht Clubs.

Captain A. Loring Swasey, USNR, and Captain Constantine Siderenko, of the Russian Navy, watch maneuvers off Annapolis of Vopser MTBs destined for the British and Russians
Rosenfeld Photo

CONSERVATION OF PAPER MAKES NEW SIZE NECESSARY

▶ With this, the first issue of 1944, YACHTING goes to a new and slightly smaller page size than that on which it has appeared for the past ten years. This has been made necessary by the war and the necessity of conserving paper, a vital war commodity. The new overall size is 9″ x 12″. With the acute shortage of wood pulp and the products made from it, all magazines were forced, in 1943, to save 10 per cent of the paper they consumed in 1942. In 1944, these magazines face another cut of 15 per cent. We are sure our readers will feel the same as we in our desire to comply with this necessary restriction.

GEORGE A. CORRY

▶ Commodore George Arthur Corry, affectionately known as "the father of the Star class," passed away at his home at Port Washington, L. I., early in December. Always referred to as "Pop," his name was a byword in the yachting centers of the world. Commodore Corry was a perpetual honorary commodore of the International Star Class Yacht Racing Association, which is today the largest One Design yachting organization.

His beloved *Little Dipper*, which carried the coveted "No. 1" on her sail, was, for years, a familiar sight at the principal regattas, and it was only in recent years, when she had become so outdated that she offered little competition, that "Pop" gave up active racing. Between 1900 and 1916, Commodore Corry won more than 500 trophies, and, of these, his most cherished was a gold watch bearing the burgee of the Larchmont Yacht Club. This was given to him in 1904 when he took five firsts and one second prize in six races. He was interested in many yacht clubs, and particularly the Manhasset Bay Y.C., of which he was one of the founders.

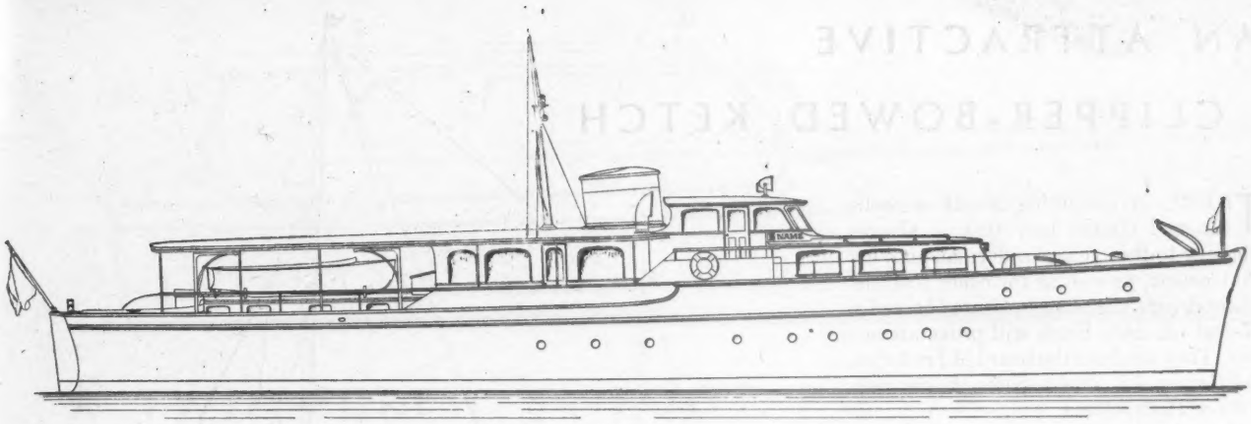
Few are the men who have worked so hard or so consistently to further the sport of yachting, and his passing is a loss to yachtsmen everywhere.

George A. Corry

YACHTING'S DESIGN IDEA CONTEST

▶ Almost before the ink was dry on the December issue, comments began to come in on the Design Idea Contest, open to both professionals and amateurs, which was announced on page 48 of that issue. It is particularly gratifying to have an accolade from as distinguished a designer as P. L. Rhodes. "Your Design Idea contest," he commented, "is not only a very good idea, but it is perfectly timed. There is nothing that will benefit the sport of yachting quite so much as to have all interested parties, both professional and amateur, project their ideas in black and white, rather than in inconclusive conversation. I haven't any idea what will come out of it, but I'm sure it is going to initiate some serious thinking in the right direction."

Conrad Solves the Steward Problem



AN UNUSUALLY INTERESTING 88-FOOT TWIN SCREW DIESEL CRUISER

FOR the man who is thinking of doing any extended coastwise or Great Lakes cruising after the war, this 88-footer, from the board of John H. Wells, of New York, is sure to prove interesting. The designer has had wide experience in power cruisers of this and somewhat larger size, some of the most successful prewar cruisers of this type having been developed by Mr. Wells.

Thoroughly modern in every particular, and embodying many new features, the plans show a yacht 88′6″ long over all, with 17′ beam and a draft of 4′6″. Powered with two 300 hp. Diesel engines, a top speed of 15 knots can be had, which is ample for a cruiser of this type.

The two deckhouses give spacious living quarters. The dining room has an over all of about 16½′, and a mean width of about 11′. The living room has an over all length of about 14½′ with a mean width of a little more than 11′. These two rooms are connected by means of an inside passage.

The after cockpit is in reality a submerged deck. Fishing chairs can be arranged here, if desired, although this is a very large boat for practical fishing parties. Eight people can be comfortably seated in this cockpit.

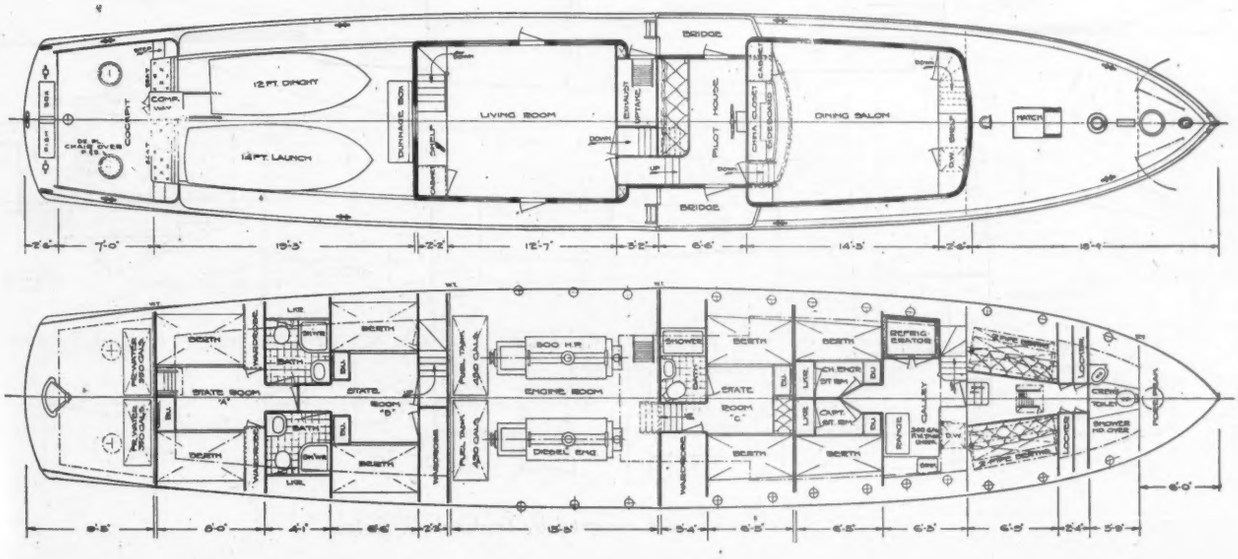
The accommodations below deck provide for three double staterooms for the owner, each the full width of the ship and with private bath in each room. Staterooms A and B are located in the after end of the vessel, and Stateroom C in the forward end, which is reached by a stairway from the forward end of the living room.

Accommodations are provided forward for a crew of five, the captain and engineer each having his own stateroom. Ordinarily, a vessel of this type could be operated with a combination captain and engineer, as all motor controls are brought alongside of the steering wheel, and a combination cook-steward-waiter, and two deck hands, or four all told.

This vessel lends itself to different kinds of services, and the dimensions can be varied to suit the type of service intended. As an example of what a postwar yacht of this type and size can offer, these plans have much to recommend them.

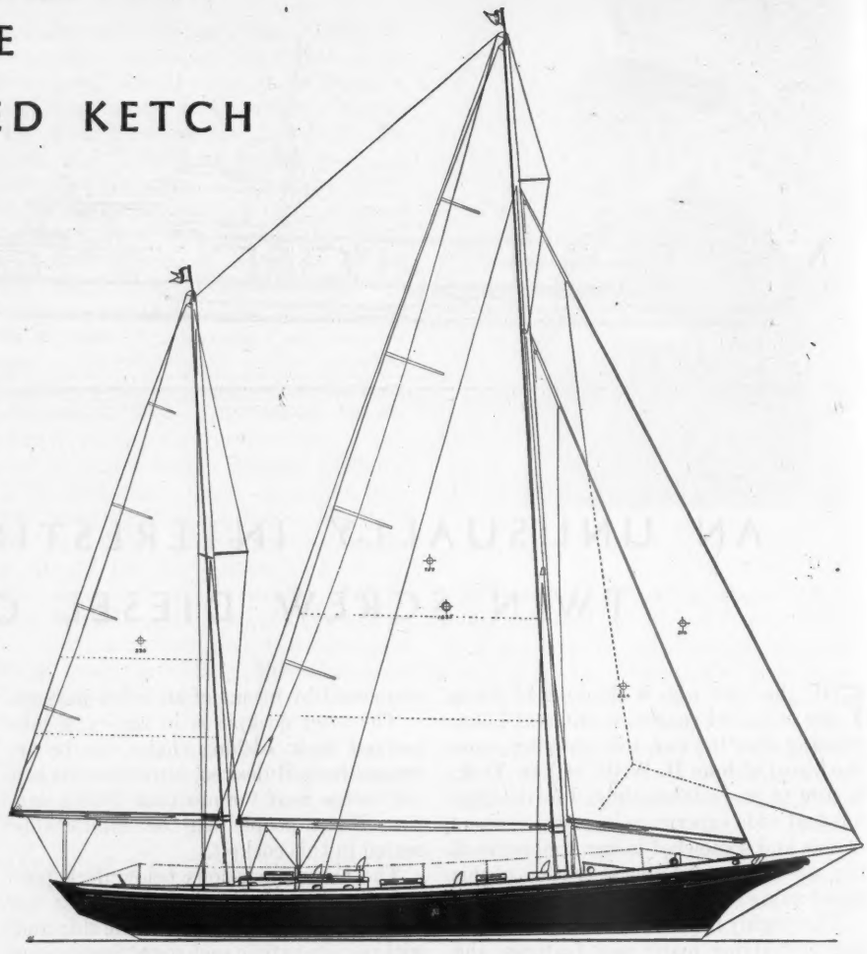
In hull design, the designer has turned a modern profile that is very pleasing to the eye. The popular curved stem is shown, into which the hawse pipe is worked, and which balances nicely the slightly raking transom. There is plenty of deck space but, if more is desired, the deck over the after trunk cabin could be modified for seating and lounging purposes. By omitting the permanent roof, this deck could be widened and made practically the full width of the ship, with an awning frame and awnings arranged to give shade if desired.

Deck and accommodation plans of an 88-foot cruiser by John H. Wells, Inc.



The plans reproduced in this section are the property of the designers under whose name they appear. For further information concerning any design address the naval architect in question

AN ATTRACTIVE CLIPPER-BOWED KETCH

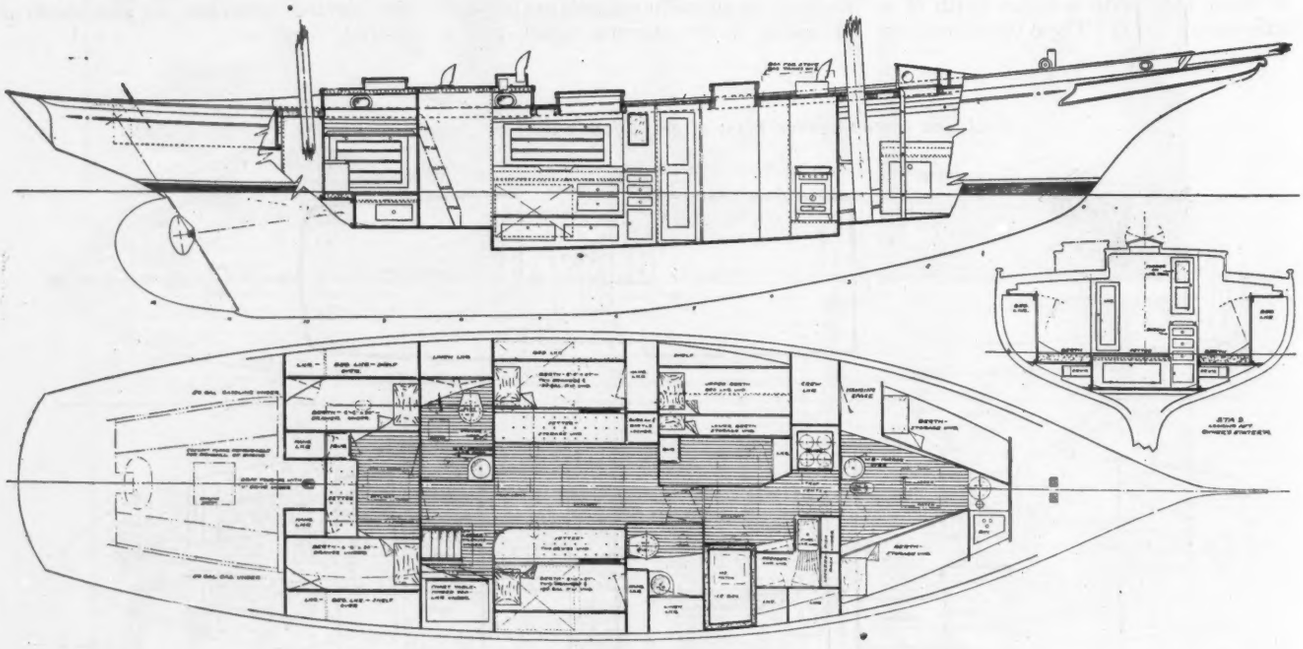


THERE is something about a well-designed clipper bow that is always pleasing to the eye of a sailorman and, for that reason, as well as for other features of her design, the plans presented here of a 57-foot off-shore ketch will prove attractive. They are from the board of Frederick C. Geiger, of Yacht Sales & Service, Inc., of Philadelphia.

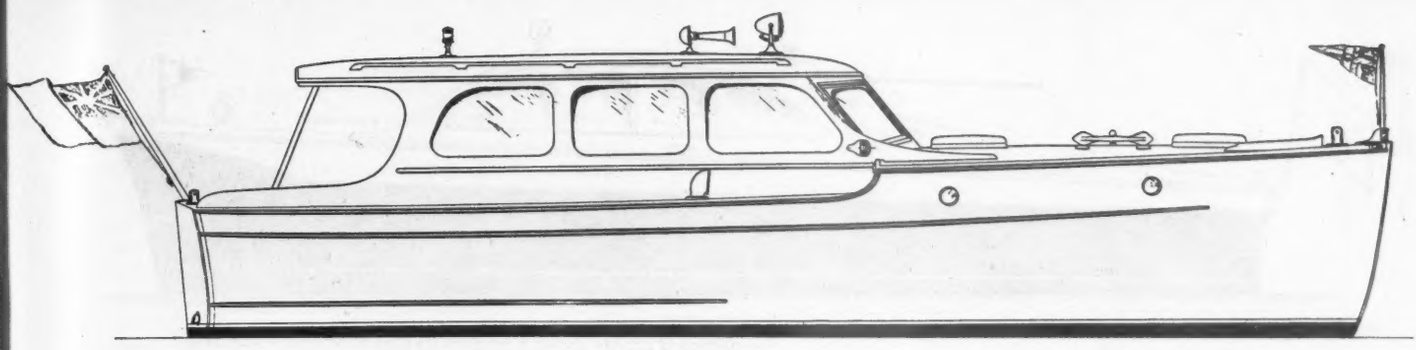
Designed for off-shore cruising, as well as for coastal work, she is a flush decker, except for a short cabin house aft over the after stateroom and companionway. This is unusual in a yacht as small as this, but full headroom (6′4″) over a wide floor has been obtained. The dimensions of the boat are: Length over all, 57′ 2″; beam, 15′3″; draft, 6′; sail area (four lowers), 1635 square feet. The light draft has been obtained by using a bronze centerboard which houses in the lead keel and does not come above the cabin floor. The specifications call for the best of material and fastenings throughout, with yellow pine planking, teak decks and mahogany deck trim.

The interior accommodations are generous, and provide sleeping arrangements for six persons in permanent built-in berths. There are two double staterooms, a large main cabin with fixed berths and settees, and two toilet rooms, one containing a shower. The galley is large and well arranged, and there is a two-man forecastle, although the boat could be kept up by one paid hand if necessary. Her divided rig will make her easy to handle. The engine room is aft and power will be furnished by a Gray 4-52 engine with V-drive, and there is tankage for carrying 100 gallons of fuel. A 32-volt electrical system will provide power for lighting, pumps and forced ventilation in galley and engine compartment.

Altogether, there is a lot of real accommodation for a yacht of these dimensions. Painted dark blue, with a white rail and boot-top, a gilt cove stripe and gilt scroll work on the trail board, she should present an appearance that would fill any sailorman's eye. The rig is well proportioned and pleasing, also.



A 57-foot shallow draft ketch designed by Frederick C. Geiger



A TWIN-SCREW 34-FOOT POWER CRUISER

A LITTLE power cruiser that has much to recommend her in the way of looks and in cruising accommodations is this 34-footer, designed by Eldredge-McInnis, Inc., of Boston, Mass., for J. M. Scott, of Ontario, Canada. Designed for use on fresh water, and built in Canada, she is powered with a pair of Gray 6-91 engines, driving twin screws, which give her a speed of 17 statute miles per hour. A pre-war design, she resembles somewhat the later Marblehead Cruisers, from the board of the same firm. She has been used chiefly in the Muskoka Lakes region, between Trenton, Ont., and Georgian Bay.

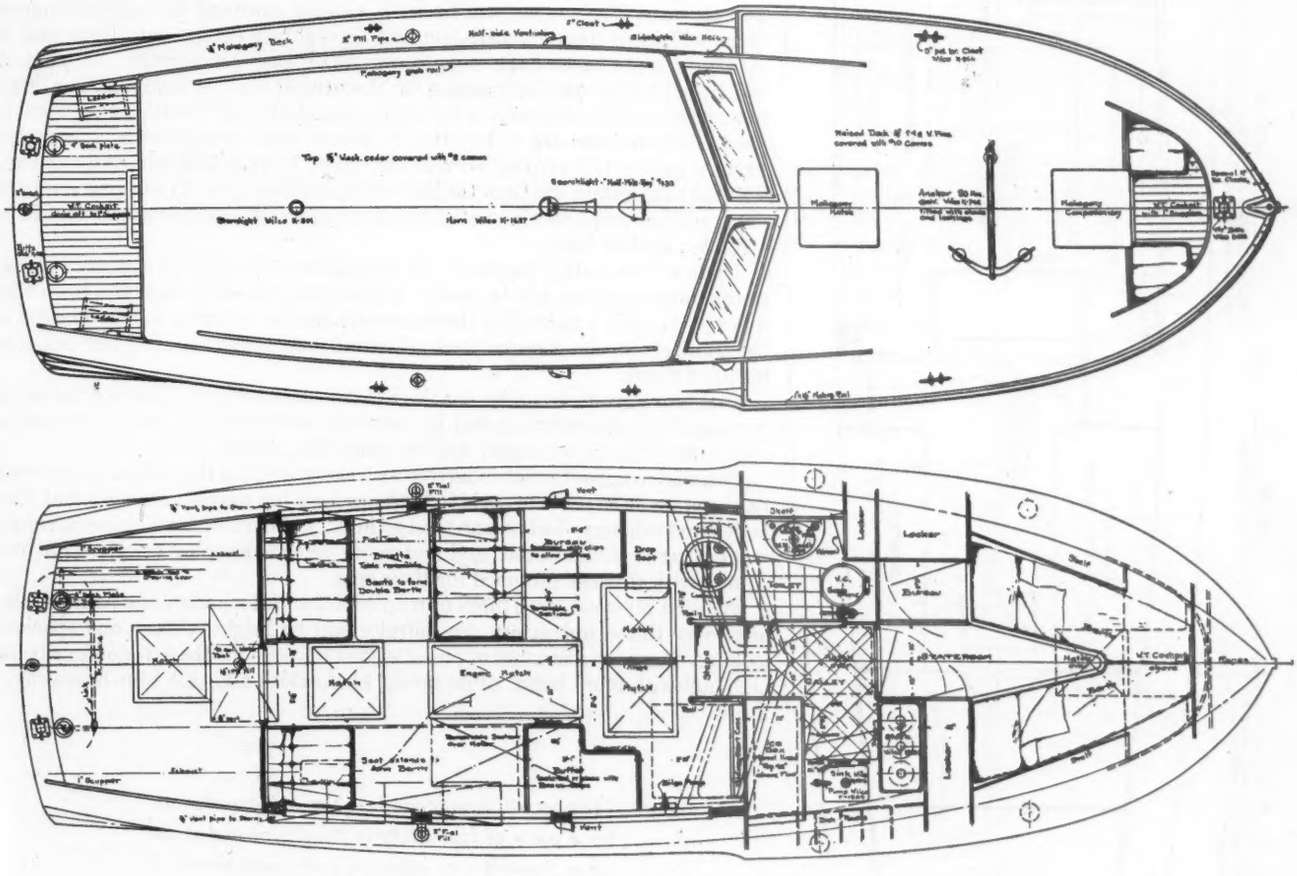
The plans show a husky, beamy boat of the raised deck type, arranged to sleep, comfortably, five persons. Her cabin plan provides for a double stateroom forward under the deck, a large galley, and toilet room. The deckhouse is fitted with bureau, buffet, and seats that slide to accommodate three when used as berths. Complete steering and engine controls, chart case, instruments and other navigating facilities are also located in the forward end of deckhouse. The main deckhouse is somewhat larger than usual but makes for good cruising comfort, particularly on inland waters where tidal conditions are not to be coped with.

The motor compartment is completely insulated to prevent noises escaping to the deckhouse and is equipped with starting and lighting batteries, Maxim silencer, waterjacketed copper exhaust pipe, lubricating oil stowage, bilge pump, etc. All plumbing has chromium plated fixtures, and the galley is lined with Monel metal and fitted with a Wilco three-burner alcohol stove.

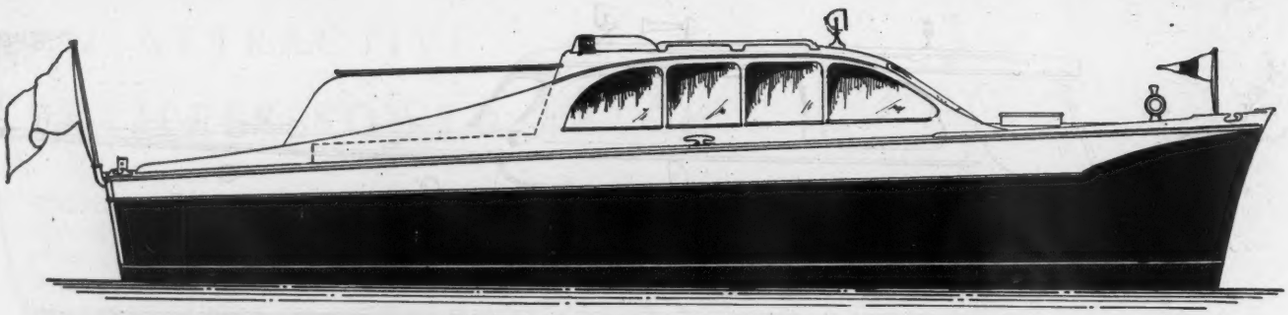
A small bow cockpit is located forward for ease in handling ground tackle. The usual equipment, such as one-half-mile ray pilot-house-controlled searchlight, electric horn, electric running lights and necessary deck appointments, completes the list of such gear.

The chief dimensions of the little boat are: Length overall, 34′; water line, 32′6″; extreme beam, 10′11″; draft, 2′10″; displacement (fresh water), 12,635 lbs.

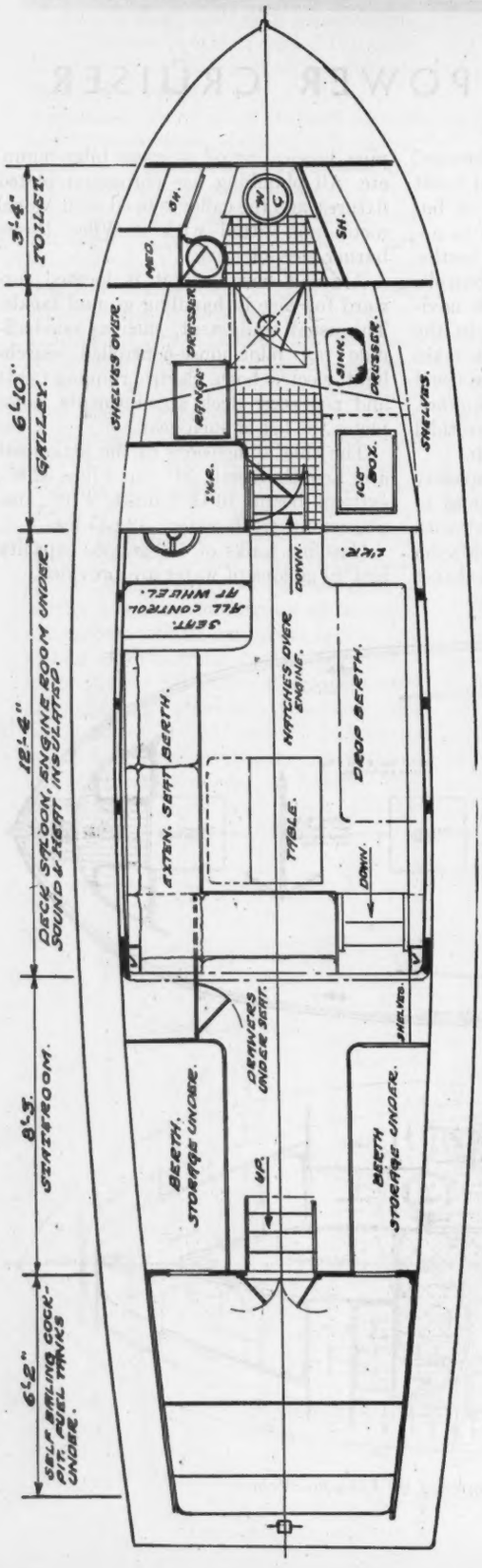
Gasoline tanks of 150 gallons capacity and 40 gallons of water are provided.



Plans of a twin-screw 34-foot cruiser for fresh water use designed by Eldredge-McInnis



The outboard profile shows a modern treatment of house and sheer



A TRIM MOTOR CRUISER FOR POST-WAR SERVICE

THIS interesting packet is from the board of William H. Millett, naval architect of Alexandria, Virginia, and is, the designer states, "My idea of a conservative, modern design for the future." Her principal dimensions are as follows: Length over all, 42′ 6″; beam, extreme, 11′ 6″; draft of water, 3′ 4″. The scantlings are fairly stout without being unduly heavy, the keel being of oak, sided 3½″, with a 1″ by 5″ keel batten on top of it. Frames are of oak, 1¼″ by 1¾″, 12″ center to center, and 1¼″ by 1¼″, 10″ centers. Floors are also of oak and are sided 1¼″, thickened to 1⅜″ under the machinery. The center keelson is of yellow pine, 2″ by 3″; the clamp is 2″ by 3½″ and stringers in general are 1½″ by 2½″. The outside planking is of mahogany, finished ⅞″. The deckhouse is to be built of the new moulded plywood, light but strong special construction. The windows are to be sashless and to have special lifting gear.

The motive power will be a pair of Gray gasoline engines which develop 100 to 150 horse power, according to the speed desired. The lower power will give the boat a speed of 18 miles per hour and the larger power plant will drive her at a 24-mile pace. The engines will be set in oiltight pans and the engine compartment will have special ventilation and fire-fighting equipment. There will be plenty of room around the engines, providing easy accessibility. All controls will be led to the steering position for the utmost ease in handling. One of the new, wartime developments in hydraulic gear shifts and throttle control will be used. Twin rudders are to be fitted to ensure easy maneuvering. A complete battery system will provide current for lights, horn, searchlight and windlass. The lighting system will be of the indirect fluorescent type. The engine compartment will be completely insulated for heat and sound, and the cabin top will be insulated against heat.

There will be neither portholes nor deadlights in the sides of the cabin trunk; in the daytime, there will be plenty of light from the deckhouse and from windows in the after bulkhead of the stateroom and in the galley hatch. The top of the trunk aft forms a fine sun deck; if desired, additional handling gear could be installed there.

Fuel tanks are to be under the floor of the after cockpit. They will be set in pans and the compartment will be carefully ventilated and safety-proofed in every way. The water supply will be about 200 gallons.

There is a compact toilet room forward, abaft which is the galley. No attempt has been made to provide cooking facilities for a ten course dinner — that may be secured ashore — but no one need go hungry aboard with the galley arrangement what it is. The cabin and stateroom provide sleeping quarters for four adults, with stowage provided for their gear.

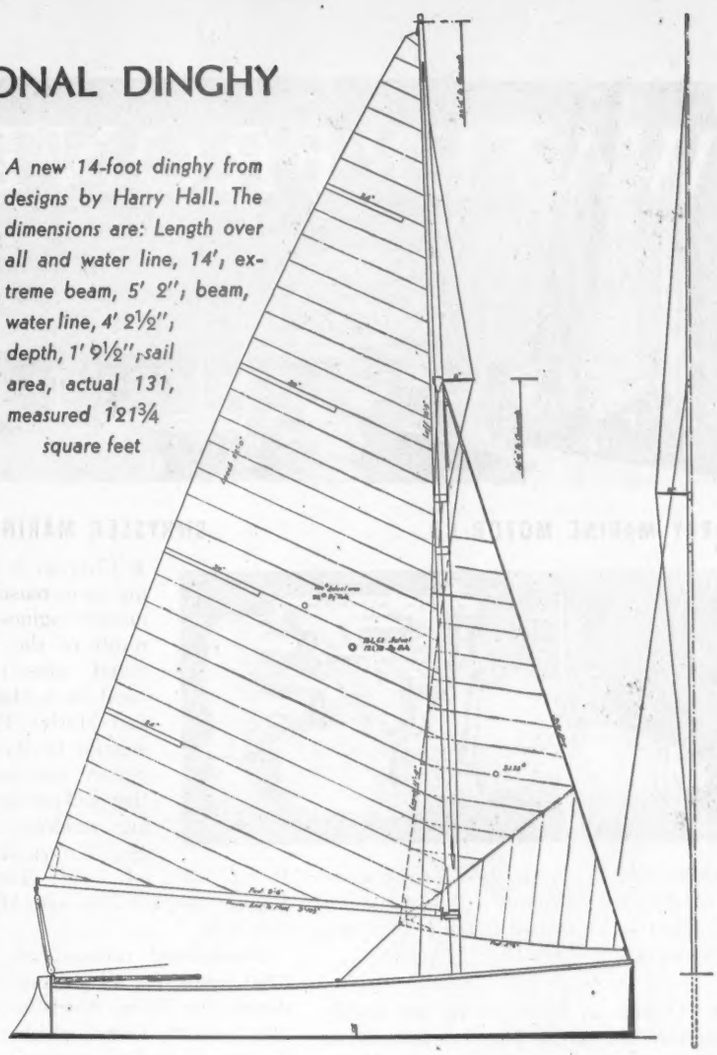
By using plywood, with birch or maple trim and the joinerwork painted, also using gay tinted upholstery, the interior will be bright, cheery and spacious looking. There are a number of possible combinations for the exterior, one being blue hull with ivory band, white house, khaki cloth and pale blue house top.

The boat will furnish good cruising accommodations for a party of four adults in deckhouse and stateroom. Forward is an adequate galley with the usual fittings and in the bow is a compact toilet room

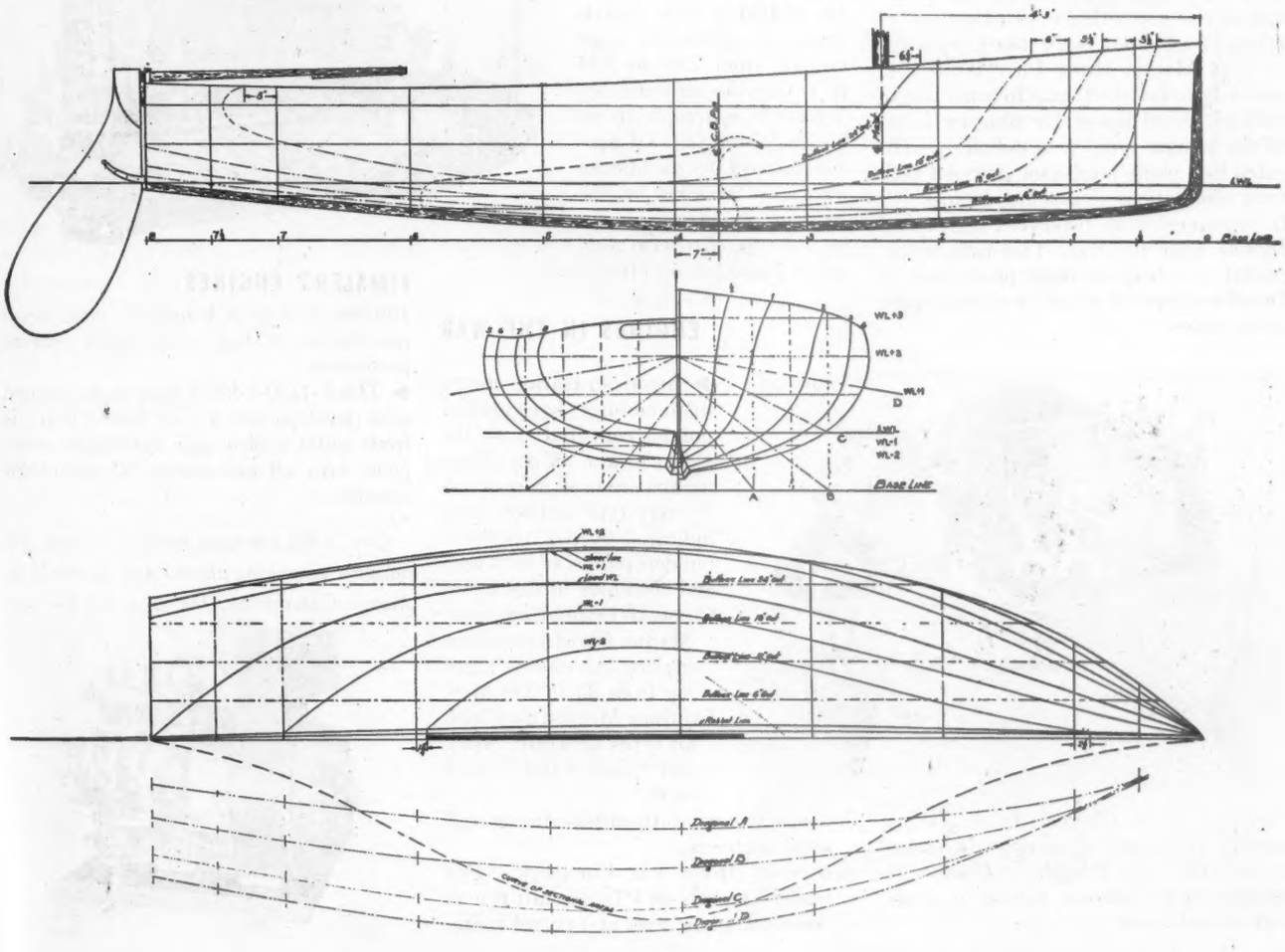
A NEW 14-FOOT INTERNATIONAL DINGHY

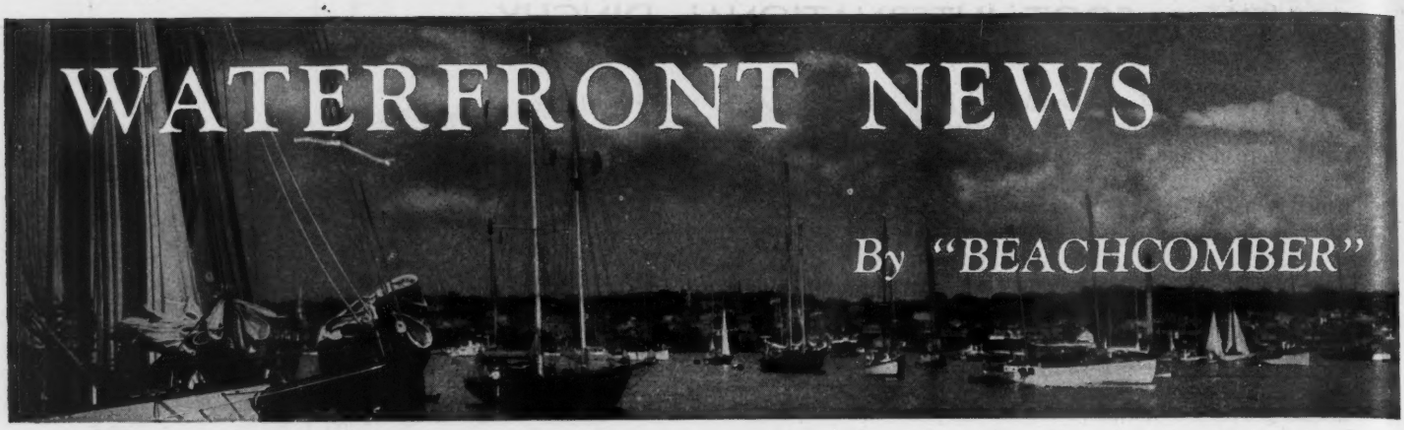
WHILE the 14-foot International Dinghy has become very popular in Canada, particularly on the north shore of Lake Ontario, and has been developed on the American side in a one-design class which was built from the model of the famous British *R.I.P.*, imported for that purpose, the 14-footers have not been taken up to any great extent by dinghy sailors on the coasts or on Lake Michigan, where the smaller 11½- and 10-footers of the Frostbite Classes still are sailed. Yet the 14-footers are so much more of a boat, and have so much to recommend them, that they will undoubtedly grow in popularity after the war, when sailing and building conditions get back to normal. Here are the plans of a new boat, designed to the rule by Harry Hall, of City Island, which Ernest and Colin Ratsey are going to build. She is an unusual and interesting boat, and her lines will stand careful study.

Harry Hall has turned out two dinghies that were an outstanding success, the 14-foot *Hawk*, which won the Prince of Wales Cup in England, in 1939, against 53 starters and was second in 1938 in a fleet of 51 starters, and the *C Squared*, a 12-footer, which is phenomenally fast in a breeze. They are the only American-designed dinghies that have been racing in England. The plans of this new boat are a composite of the two just mentioned, and also embody some of the desirable features of a Charles Nicholson dinghy, designed and built for the late George Ratsey. The lines are particularly sweet and easy, and the reverse curve in the forward sections gives plenty of flare at the deck, which should make for dryness, yet retain the necessary fullness at the forward end of the water line. We are glad she is to be built so that she can be seen in action, and she should make many converts to the ranks of the 14-footers.



A new 14-foot dinghy from designs by Harry Hall. The dimensions are: Length over all and water line, 14'; extreme beam, 5' 2"; beam, water line, 4' 2½", depth, 1' 9½", sail area, actual 131, measured 121¾ square feet

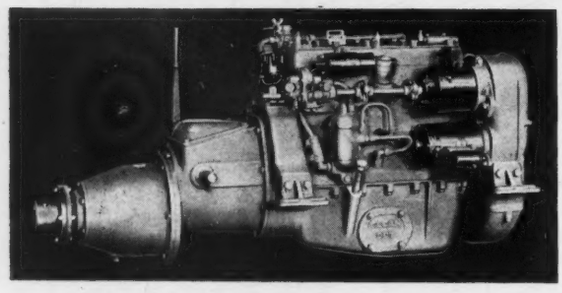




WATERFRONT NEWS

By "BEACHCOMBER"

GRAY MARINE MOTOR CO.



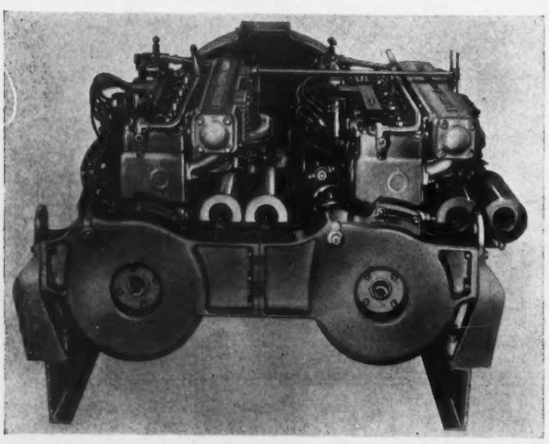
Illustrated is a special style of Gray model Four-52 gasoline engine with a 3:1 reduction gear which is used in the U. S. Army Engineers' 18' utility boat.

▶ "Owners of large yachts are keenly interested in marine Diesel developments which will come out of the war as the result of Navy experience with this type of power," says John W. Mulford, president of Gray Marine Motor Co. "While it is too early to talk of 'things to come' in the field of Diesel power for pleasure boats of the cruiser type, it is definitely indicated that many boats now powered with twin installations of gasoline engines will be repowered with two-cycle, high speed Diesels after the war. This can be expected . . . because mass production of Diesel motors will result in substantially lower prices."

CHRYSLER MARINE ENGINES

▶ Chrysler is now producing an increasing volume of marine engines as a natural result of the wartime demand, plus the development of a Marine Tractor and Marine Tug in which engines of its own manufacture are used. In 1944, they will produce the following models: Ace (3¼ x 4⅜), Crown (3 7/16 x 4½), Royal (3¼ x 4 7/8), Twin Marine Engine (3¼ x 4 7/8) and Marine Diesel (3¾ x 5).

Horsepower ratings are 3200 r.p.m. for all engines except the Twin, which is 2600, and the Diesel, which is 2400. All of these engines are available with various types of reduction gear, ranging from 1.43 to 9.11 to 1. Chrysler also makes a Vee drive adaptable to its 6-cylinder engine. Of special interest to yachtsmen who are thinking of the postwar period are an improved type of reverse gear, and a Full-Flow oil filter.



Illustrated is the Chrysler Twin Marine Engine (front view). This engine is formed by mounting two Chrysler "Royal" 8-cylinder engines abreast, turning a single shaft through gears.

ENGINES IN THE WAR

▶ American marine engine manufacturers have made a notable contribution to the nation's war effort. Their motors are used in warcraft of every type and size, as is indicated by the reports of builders published both here and elsewhere in this issue:

Cummins Engine Company: Marine Diesel propulsion engines, four models, ranging from 33 to 250 hp.

Evinrude Motors: used with all types of Army, Navy and Coast Guard small craft.

Johnson Motors: outboards on bridge and ferry pontoons.

Hall-Scott Motor Car Company: "Defender" models on PTs, aircraft rescue vessels, landing craft and patrol boats.

Kermath Manufacturing Co.: a wide variety of models, 225 hp. to 1000 hp., on craft ranging from 26' to 104'.

The National Supply Company: four-cycle Diesels of various sizes and hp.

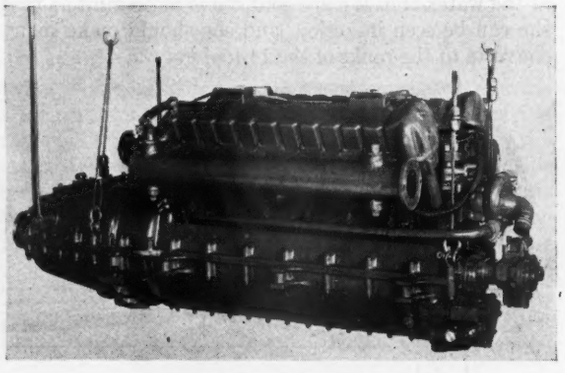
Packard Motor Car Company: 4M-2500 type engine for use in various types of PTs and aircraft rescue boats.

Palmer Engine Company: LLH type engines for 24' lifeboats.

Scripps Motor Company: V12, V8 and 6 cylinder engines of from 95 to 300 hp. for landing barges.

Witte Engine Works: 9 hp. Diesel engines and 12 hp. Diesel-elecplants.

Kiekhaefer Corporation: Mercury outboard motors.

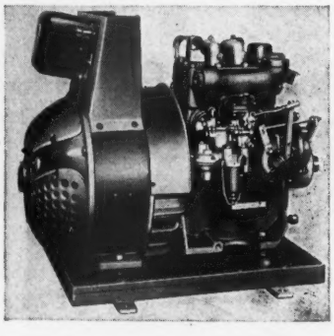


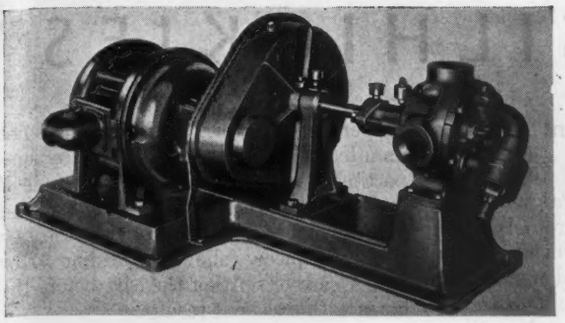
VIMALERT ENGINES

Illustrated above is Vimalert's most recent contribution to high performance marine propulsion.

▶ This V-1150-1 direct drive supercharged unit develops 400 hp. at 2300 r.p.m., is fresh water cooled and its weight, complete with all accessories, is only 1680 pounds.

One of the numerous models of fixed and portable generating plants made by the U. S. Motors Corporation. This is a 2½ kw. unit



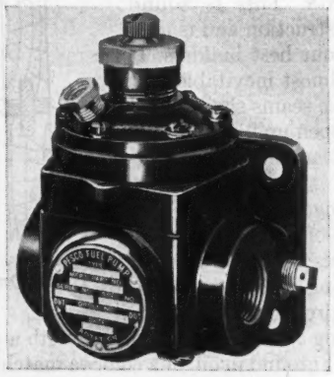


Rotary hand types serve as bilge pumps on life boats, while high pressure models are used as "dead ship starting" pumps. The life boat types have been used for many years as bilge pumps on small pleasure craft, and the small power models have proven highly effective for engine service on Diesel yachts.

VIKING PUMP CO.

The above illustration is of a bronze fitted fuel transfer pump for FP Army cargo boats.

▶ Viking pumps have found wide employment in Army craft. Fire and bilge pumping units are used on MTL boats; Diesel fuel and lube oil pumps, on Army tugs; fuel transfer pumps, on FP cargo boats; and cargo unloading pumps, on 110′ Army barges.



PESCO PRODUCTS

The Pesco fuel pump illustrated above is used on the marine engines installed in motor torpedo boats.

▶ The Pesco Products Co. are the manufacturers of fuel, special oil, bilge and hydraulic pumps for marine applications. Various units of their products incorporate new materials, such as neoprene for the diaphragms, as well as various types of plastics.

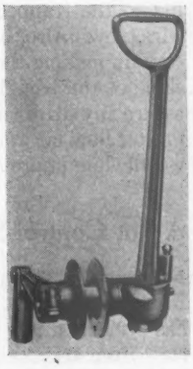
BLACKMER PUMPS

Below, a Blackmer approved lifeboat hand pump, model MB-202.

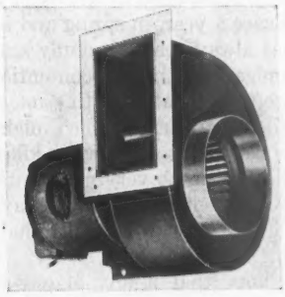
▶ Blackmer pumps are of two basic types. The rotary power models are used for the transfer of fuel and lube oil, and as fuel service pumps for Diesel engines.

MARINE PRODUCTS CO.

Right, Marine Products Co.'s throttle and clutch control and, upper right, their centrifugal bilge pump, series 130.



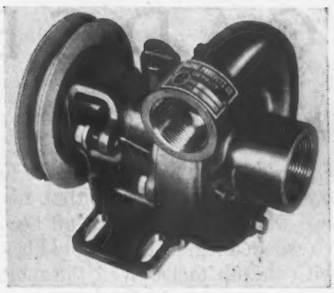
▶ Marine Products Co.'s bilge pump has many interesting design characteristics. The bases in standard models are slotted to permit adjustment of belt tension. Pulleys carry radial load directly over the ball bearing, which is both sealed and grease packed. Intake and discharge are threaded for standard pipe sizes. Packing gland is backed by semi-permanent metallic packing. Shims and gaskets are provided in the design; drain plug or drain cock is included.



E. J. Willis Co. blowers are made in sizes ranging from 3″ to 10″, and may be mounted at various angles

ELECTRONICS LABORATORIES

▶ There is little doubt but that many post-war yachts will be illuminated by fluorescent lighting, and a compact unit for furnishing the power for such systems is the Electronics Laboratories model MA2B. It has an input of 6 volts DC, and output of 110 volts AC and a capacity of 50 watts. Other power suppliers made by the same firm, and suitable for marine lighting systems, ship-to-shore telephones, broadcast band and radio receivers have input ranges from 6 to 110 volts DC and capacity from 50 to 225 watts.



SPARTON MARINE SIGNALS

Sparton type 203, pictured below, is seeing service on Navy, Coast Guard, Army, Red Cross, Fire and Police Department vessels. It is a high pitched, long range siren available in 6, 12 or 32 volt models. It comes in polished brass with floor button and cable.

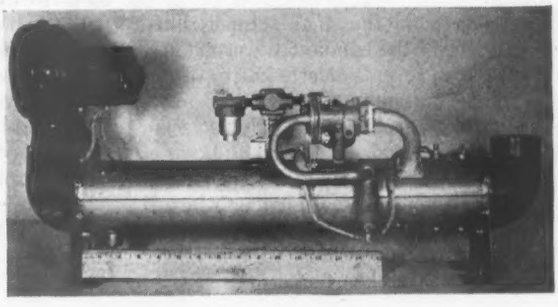
▶ The manufacturer, The Sparks-Withington Co., has long made a wide variety of marine signals of wide design and mechanical variation.

SOUTHWIND COMBUSTION HEATERS

Below, one model of Stewart-Warner's South Wind Hermetic Combustion Heaters which are used as cabin and compartment heaters on motor torpedo boats.

▶ Since the advent of the war these heaters have been successfully used in aircraft, combat vehicles and in boats. The obvious advantages of an extremely high heat output in a very small package plus the inherent safety of burning a highly volatile fuel in a hermetically sealed chamber presented an almost immediate solution to both personnel and equipment heating. This was necessary not only for the purpose of comfort, but also to insure operation of equipment under adverse temperature conditions.

Stewart-Warner states that this type of heater can and will be adapted for use on the post-war pleasure boat — whether power, auxiliary or sail.



"GADGETS & GILHICKIES"

A Use for Old Tools

▶ There is an old story about the fellow who was such an optimist that he was pleased when his leg was cut off because, with a wooden leg, he could hold his socks up with thumb tacks. Well the moral of the tale is to make the best of a bad bargain. As applied to tools, it has much to recommend it. It happens that the steel in a good file is of such excellent quality that it makes a first class scraper, so, when your files get old and dull or rusty, remember there is still a lot of usefulness left in 'em. A three-cornered file, if each of its three sides is held against a grinding wheel until the old teeth are removed, makes a very fine scraper when pushed into a wooden file handle. A flat file may be heated to a cherry red and bent into the form shown in the sketch. When chilled in water, the steel will be sufficiently hardened for scraping (if too hard it would be impossible to sharpen the scraper with a file). Grind both ends, as indicated, and you will have a tool which is excellent for raking out old putty and for removing paint and varnish in small spaces.

I have found the small scraper, illustrated, one of the handiest I ever made. I always keep several palette knives of different sizes in my tool kit (they make wonderful spatulas for applying seam filler, plastic wood, glue, etc.) and one of them got broken. When ground as shown, however, it made a small scraper which is most handy in restricted spaces and for raking out narrow seams. Moral: Never throw away a broken tool.

A Drip Pan Improvement

▶ In September YACHTING, I ran a description of a Safety Drip Pan and soon thereafter received a letter from William Bross Lloyd, of Boston, in which he made what I feel to be a very good suggestion. By extending the drain tube almost to the bottom of the glass jar, and putting enough water in the bottom of the latter to well cover the end of the tube, there would be no possibility of a backfire reaching to the trapped gasoline, if any, says Mr. Lloyd. Also, he feels that it would be wise, in making the drip pan, to make the slope of the trough in its lid sufficient to assure any drips running to the center, no matter how far your boat may heel. Both worthwhile improvements in my opinion.

A Rot Control Suggestion

▶ From Lt. Comdr. Roy MacPherson, USCG, of Boston, comes a scheme that has prevented any signs of so-called "dry rot" from attacking his boat. He says, — "My boat *Comewa* was built in 1926 and it had the usual life, including the layups of a yacht. Up until the time I turned her over to the Coast Guard, two years ago, she had never shown any signs of dry rot. I attribute this not only to careful ventilation and to prompt repair to any fresh water leaks, but to a fact which I have never heard discussed by any other yachtsmen. Twice a year, in spring and fall, the boat has always been carefully sealed up and fumigated. It is my contention that this careful fumigation with *cyanogen* not only killed any vermin which might have been aboard, but effectively killed any fungus life. Will be very much interested to know if any other yachtsmen have tried this or if any experts could pass judgment thereon."

I do hope that if any of our readers have had any experience with this, or any other treatment for the prevention of rot, they will drop me a line as I am building up a file of information that is available to any yachtsman who is interested in the subject.

A Clever Dodge

▶ Here is another case of necessity giving birth to an invention. A couple of years ago, Austin Murray was up to his ears with the building of a lovely little cruising cutter. Being an amateur, he was not equipped with all the power tools that he would have liked to own, and some of those that he had were rather too small for the work of boat building. One of his particular problems was that of cutting his larger pieces with his small band saw. It just isn't feasible to slide those heavy chunks of wood across the table of the average 12" or 14" saw. Being a resourceful person, however, Mr. Murray was not daunted. He solved the problem by supporting the pieces to be cut on a couple of firm saw horses and by mounting his band saw on rollers and then moving the saw along the piece, following the line to be cut. A case of putting the cart before the horse with excellent results.

Transom Repair

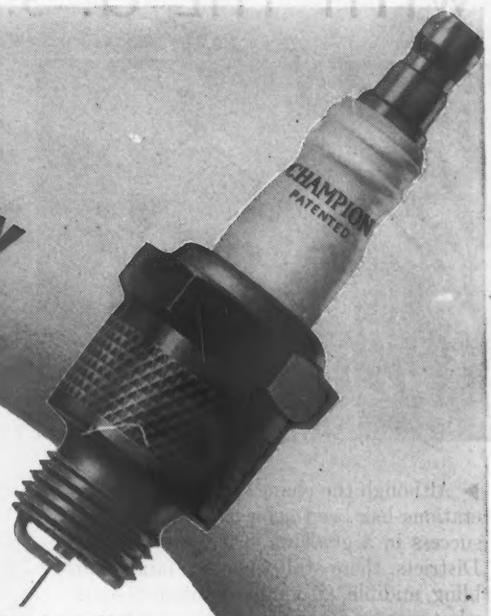
▶ These are the days when everyone is his own repair man. A description of a method of repairing the transom of a boat that has been neglected seems appropriate. Many transoms, particularly on small boats, are built with a spline, or feather, fitted between the glued joints. This is sound construction and is used by our best builders. It is almost inevitable that these seams should tend to open up in time, with the action of swelling and shrinking, due to changes in moisture content of the wood. If your seams have opened to ⅛" or less, they may be repaired by simply applying whitelead putty, mixed with a pigment ground in oil, of a color to match the wood of the transom. This will harden and may be sanded and varnished to look very well.

If your transom has opened up more than ⅛", it is a better plan to fit a couple of splines into the cracks — one on the forward side and one on the after side of the transom. Take a piece of the same kind of wood as was used to build the transom and fit it very carefully to conform with the shape of the cracks, allowing about 1/16" to protrude above the surface. The cracks should, of course, have been thoroughly cleaned out with a scraper like the one described above, made from the tail of an old file. Using Weldwood waterproof glue, glue and clamp the splines in place. When the glue has set, plane them off flush with the surface of the transom and you are ready to paint or varnish. The results are well worth the effort for the boat's appearance will be vastly improved by such simple repairs.

There are any number of repairs of this nature that one can make at times like these — and improvements too — which are well within the scope of the amateur. I hope that if any of my readers have any bright ideas that might prove helpful, they will send 'em along. They will be given to a waiting world and will contribute to the enjoyment of your fellow sailor. Fair winds for the New Year.

HAM DE FONTAINE

CHAMPION DEPENDABILITY



IS PART OF SUCCESSFUL INVASION

In the dramatically tense moments before invasion, water-borne troops must feel a certain security in the superb quality and performance of their equipment. Nothing is left to chance, in so far as is humanly possible. Checking and re-checking, inspection and testing, rehearsal and re-rehearsal, all engender confidence and raise morale to a high pitch. That's one of the important reasons why the American soldier, sailor or marine is the superb fighting man that he is.

The landing craft that bring invasion troops in to "hit the beaches" must come through regardless of "hell and high water." Here dependable Champion Spark Plugs are actively in the vanguard of invasion, insuring the dependable ignition so necessary to faultless engine performance. Thus Champion Spark Plugs are once again playing their vital part—adding to their already unequalled reputation for maximum performance and dependability.

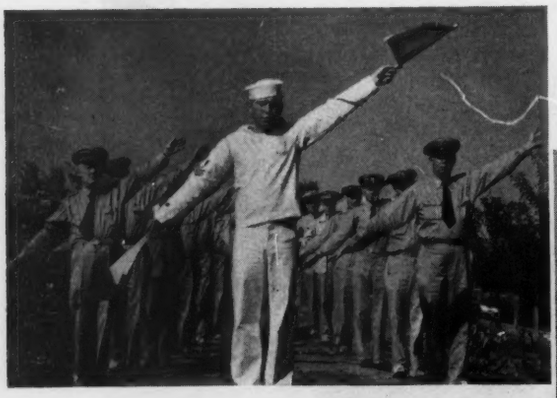
Photo by U. S. Army Signal Corps

CHAMPION SPARK PLUGS

ARMY E NAVY

LET'S ALL BACK THE ATTACK—BUY BONDS

WITH THE U. S. COAST GUARD AUXILIARY



Signal practice or full dress parades, loading live ammunition or checking in a fish boat — it's all in the day's work for men of the Auxiliary and Reserve

▶ Although the change-over to shore operations has been achieved with uniform success in a great majority of the Naval Districts, there still persists a faint rumbling, audible, although by this date somewhat *pianissimo*, regarding the regulations forbidding the operation of and duty afloat in Auxiliary vessels. Although it is not the function of this Department to discuss the pros and cons of Service regulations, we feel that the publication of the following letter will do much to clarify the matter for those members who are still puzzled by the turn of events. The letter in question was written by Captain Jones, Director of the Auxiliary, to a district officer on the West Coast. It reads, in part, as follows:

"Through a series of incidents, Headquarters has been constrained to issue a letter which in effect denies the use of Auxiliary vessels, as such, by the Coast Guard. The only vessels which may be used by the Coast Guard are Coast Guard Reserve vessels, in other words, private boats which have been loaned to the Coast Guard for full time use for the duration or for some definite period. In some districts, a large number of vessels were taken into the Coast Guard Reserve, and when orders came to reduce the number of vessels by a certain percentage, those districts were consequently in a favorable position. They could reduce without seriously interfering with operations. In a few districts — Seattle being one — boats were not taken into the Coast Guard Reserve to such a large extent but were operated in the Auxiliary status, and when the reduction in the use of CGR boats came about, it appeared that such Auxiliary use was contrary to the spirit of the orders which were promulgated nationally.

"There is no doubt in my mind that the war effort is far more advanced by adding boat operations in enemy waters than by continuing boat operations in local waters. In this connection, every military officer has to distribute his forces to the best advantage. He places weight where weight is vital, and in places where weight can be reduced he must always take what are frequently called 'calculated risks.'

"There is no doubt in my mind that the front lines were actually very close to our shores shortly after Pearl Harbor . . . now the front lines have moved well across the oceans on both sides. We are, therefore, justified in assuming calculated risks within the borders of the United States, by curtailing our activities in order that we may in no way interfere with the activities abroad. I feel, then, when this is explained to the Auxiliary members who are temporary members of the Reserve, that they will understand that we should not attempt to operate any more boats than are absolutely necessary for the duty. The Temporary Reserves from the Auxiliary, and in fact the whole Coast Guard, are only a part of the defense forces, and we can expect, as long as the war continues, changing methods of operation.

"I have no doubt right now that there are millions of men in camps and in harbors just awaiting the next move, and I would not be surprised at all if some of those men have not been in that situation for over two years. It is irksome to them to have to wait until all the elements are ready for the move in which they will take part. Therefore, I feel that the answer of the Auxiliarists who are temporary members of the Reserve should be the same answer that the whole Coast Guard gives to any order: the simple 'Aye, aye, Sir!' And, in the meanwhile, keep ourselves in readiness for whatever changed conditions may arise. No plan of campaign evolved by one group of men would be exactly like the plan of campaign evolved by another group of men; but we are all members of the same most complicated team, and it may be that for a while we can best serve the team by staying on the side lines."

There, in so many words, is the story. Today both the Auxiliary and the Temporary Reserve have the largest membership in their history — approximately 47,000 and 28,000 men respectively — and there is every assurance that "Aye, aye, Sir" is on the lips of each and every one of them.

▶ In the belief that members, wherever located, will be interested in a summary of the year's activities of the various Districts, this and subsequent issues of YACHTING will publish capsule accounts of such reports. The following are among the first received.

▶ The Temporary Reserve in the Fifth Naval District has been most active in taking over regular patrols and Port Security. Baltimore Harbor has a Port Security and Temporary Reserve unit comprised of five hundred men with an ultimate goal of seven hundred men set for the very near future. The Captain of the Port has and is using this force for a large percentage of port security and harbor patrol work.

The Guard Boat stationed at the entrance of the harbor of Baltimore has been functioning continuously since July 31st, 1942. This radio equipped boat and manned by the Temporary Reserve was commended by the Captain of the Port

(Continued on page 150)

SHE LOOKS like a "PT" boat but the Navy calls her "AVR." In landlubber language that's "aircraft rescue vessel." Her job is to tag along with the carrier force and rescue crashed pilots.

Every minute planes are in the air, she's on the alert for a "pick-up." She's a "fast" baby that plays no favorites and every Navy pilot calls her "sweetheart."

This little lady has to be in shape to do her job on split-second notice. And before the eyes of her skipper are instruments that tell him all he needs to know. Some of them, like the Oil Pressure Gauge, Tachometer, Ammeter and Temperature Gauges, most likely are products of Stewart-Warner. We consider it a privilege to have them there.

* * *

Helping the Navy do its thousand and one jobs gives us at Stewart-Warner a glow of pride. You've got to earn your rating to enjoy a place aboard an AVR . . . an LST . . . or any other Navy craft. Into each device goes all the skilled craftsmanship that has distinguished Stewart-Warner instruments through the years. Tomorrow, this same "know how" plus advancements learned in war will add new lustre to the phrase "Instruments by Stewart-Warner."

INSTRUMENTS BY

STEWART-WARNER CORPORATION

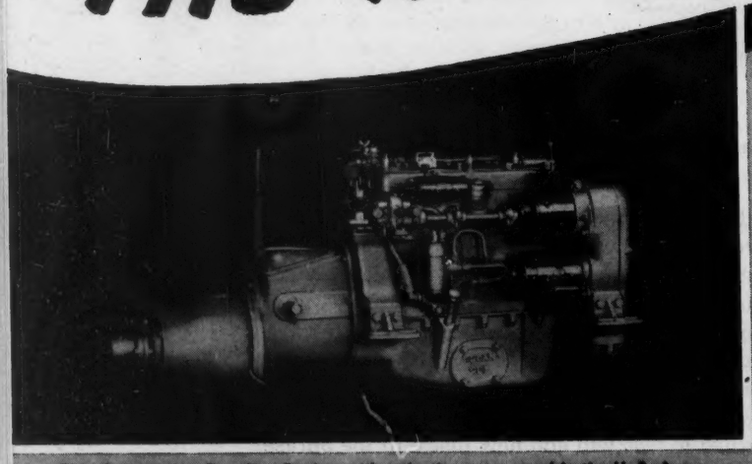
CHICAGO ILLINOIS

Another Product of STEWART WARNER

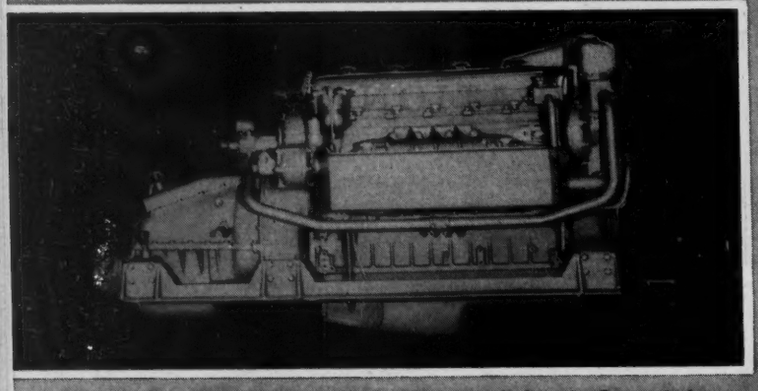
We feature this month...
THE LCP LANDING BOAT

Photo by U. S. Army Signal C

THE WORLD'S GREATEST



This Graymarine Gasoline Engine with reduction gear, used in the U. S. Army Engineers' Power Utility, shows typical Gray compactness.



The 6-cyl. Gray Marine Diesel, standard equipment in the Invasion Barges, is the [illegible] adapted and equipped for marine propulsion by Gray

The LCP Landing Boats
are powered with the same Gray Marine Diesels
as used in the Invasion Barges

The U. S. Navy's 36-foot Landing Boat, built in a number of styles, was designed by Higgins Industries for the Bureau of Ships. This versatile boat can climb beaches like a high speed turtle, back off without assistance, and it is carried on the decks of larger ships, ready for instant work. It has distinguished itself in action; it has proved useful in harbors all over the world; and it has been a decisive factor in amphibious operations wherever American troops have landed. Well known American Stock Boat Builders have applied their facilities to build it in quantities:

Chris-Craft Corporation—Algonac, Mich., Cadillac, Mich., Holland, Mich.

Horace E. Dodge Boat & Plane Corporation—Newport News, Va.

Higgins Industries, Inc.—New Orleans, La.

The Matthews Company—Port Clinton, Ohio.

Owens Yacht Company—Dundalk, Md.

Richardson Boat Company—North Tonawanda, N. Y.

Jap's Eye View of this Year's Show

U.S. COAST GUARD PHOTO

America can be pretty proud of this year's show. We can't all get tickets but we can read about it in the news dispatches, and we can remember the predecessor of the original Landing Boat exhibited two years ago at the Grand Central Palace in New York, powered with Gray Marine Diesels. Thousands of people inspected this unorthodox boat. Meanwhile, out on the West Coast, Power Scows driven by Gray Marine Engines were covering the long haul to Southeastern Alaska to bring in the salmon catch. These "sea-going box cars" were much like today's Invasion Barges.

In the vast program of preparation for the 1944 Show, it has been our privilege to work closely with the U. S. Army, Navy and Coast Guard; and with our old friends and customers, the American Boat Builders supplying the new models.

As usual, a high percentage of the boats in this year's show are powered by Gray. Every Gray owner and every prospective Gray owner can have a feeling of participation in the developments which preceded these fine engines.

Send for list of Gray's Marine Catalogs and Instruction Manuals

GRAY MARINE MOTOR COMPANY

Suppliers of the Diesel Engines for the U. S. Navy's Landing Boats and Tank Lighters • Suppliers of Gasoline Engines for Lifeboats, Lend Lease, and for the U. S. Army Engineers' Power Utility.

First Awarded December 1942; Again June 1943

MOTOR-BOAT SHOW...

This remarkable photograph, taken early in 1943 at Gray's main plant in Detroit, shows 6-cylinder Gray Marine Diesels in process for shipment to a total of 37 Boat Builders and for destinations overseas.

HERE'S WHAT WE'RE FIGHTING FOR
The Yachtsman's FIFTH FREEDOM—
which means that we'll be able to use our boats when we want to—and to sail them wherever we may plot our courses. We at Casey are doing our work towards this now by building for the armed services, and we'll be building boats like this one day again.
When you're planning for your new auxiliary, be sure to write for our circulars describing our 36, 39 and 45 footers. "CASEY BOATS ARE RARELY OFFERED FOR SALE — THEY SELL THEMSELVES"
SOERABAJA—A Casey "old timer." Designed and built by us in 1930, she has performed as a thoroughbred, gathering more than her share of racing laurels. Among the "wins" she has turned in are:
1939—Block Island Race, N.Y.A.C.—Special Prize. Vineyard Race, Vice Comm.—Rear Comm. Prize
1940—Off Soundings Race—1st Prize. Vineyard Race—First in Class B
1941—Indian Harbor Cruise—First Place Two Days. Huntington Overnight Race—1st Prize
CASEY BOAT BUILDING COMPANY, INC.
Fairhaven, Massachusetts

THE POST-WAR YACHT

(Continued from page 48)

the post-war market will be greater than in any preceding period in the history of yachting. There are, however, a number of considerations that must not be forgotten. In the first place, new construction in the first year of peace will be largely dependent upon the immediate availability of materials. Secondly, it is too early to estimate the extent of the post-war second-hand market. Although boats are now at a premium, and will undoubtedly remain so for the duration, it may be presumed that some owners will sell their craft to realize funds for new construction. But, at best, such craft will probably be few and far between.

So it indicates a bull market no matter how you look at it!

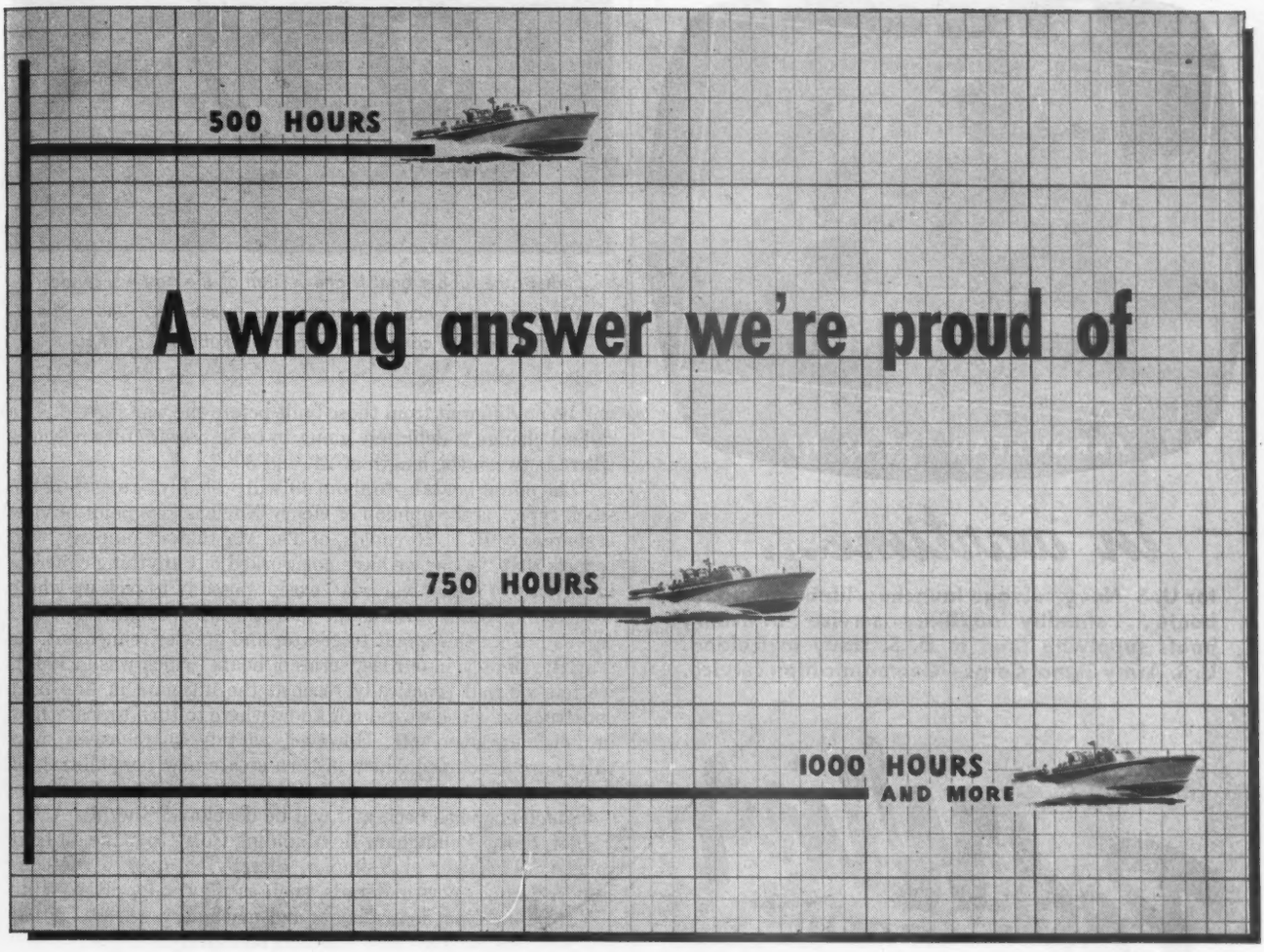
Any attempt to generalize as to what kind of a boat the greatest number of yachtsmen are seeking is doomed to failure, for the rather obvious reason that yachtsmen, bless their hearts, are dyed in the wool individualists. But, in the same way that Mr. Gallup's soul-searching polls seem to indicate which way the wind is blowing, so may it be assumed that when a representative group of sailors have a reasonable similarity of ideas that there must be something significant behind it.

In the comments which YACHTING has received regarding the broad characteristics of the post-war boat, two thoughts have been dominant. One is that the great majority of our informants believe that the new boats will differ in terms of the materials used in construction, rather than in the design of the vessel itself. The "streamlined hull" school is in a very definite minority; in fact, it is almost non-existent. All agree, however, that the employment of new materials — either plywood, plastics or light-weight metals — will necessarily permit some new building techniques, and resultant variations in design details. Equally noticeable is the consensus that there will be a far greater change in the appearance of smaller craft than in yachts larger than 50′ o.a.

"The first post-war boats, like the automobiles," says John H. Wells, "are not going to be very different from those we knew before the war. The comfortable houseboat has established a type that will continue after the war . . . but, instead of the old 4′ draft, they will be deeper as a result of the canals now permitting a draft of as much as 9′. I also find that people who go to Florida in houseboats also like to cruise to Cuba and the other islands, and these boats must be constructed to stand this service. In smaller sizes, such as the various types of stock boats, I do not believe that all this talk of streamlining will take place." Mr. Wells also points out that he believes that union-inspired government requirements (in regard to the size of the crew to be carried) will limit the size of larger vessels, for the reason that "the idea of the triple crew on an eight-hour-shift will mean so many crew members that there will be no room for the passengers."

Winthrop Warner is one of those who believes that "we will see a general shift to somewhat smaller boats, both in the auxiliary and power boat fields. There are several good reasons for this belief. The average owner will have less cash to invest, and, because of higher prices, he will get less boat for the money. As a matter of fact, boats have improved to the point where an owner can get along with a somewhat smaller vessel without sacrificing comfort, convenience or performance. The years immediately following the war will be a period of adjustment, and I believe there will be a conservative tendency which in itself will put the accent on smaller boats."

War-time construction of small war craft will undoubtedly influence the design and construction of the high-speed express cruiser, states F. Spaulding Dunbar. "However," he says, "in the auxiliary and one-design sailing classes, I believe the influence will be quite moderate . . . because the new materials and methods developed are limited in their application to post-war sailing yacht design and construction, where durability and a reasonable economy of first cost and maintenance will be more important." This belief is also voiced by Palmer Scott, who states that "the first boats built in the first season after the war



WHEN WE FIRST STARTED BUILDING Packard marine engines for mile-a-minute PT boats, the Navy asked, "How long will these engines run without a general overhaul?"

Our engineers confidently replied, "500 hours." They well knew that 500 hours couldn't knock the heart out of *this* marine engine even though they'd designed it with almost the same power-weight ratio as an aircraft engine. But that was a lot of hours to promise *unfailing* top performance at speeds ranging from a "silent sneak" to abrupt full throttle!

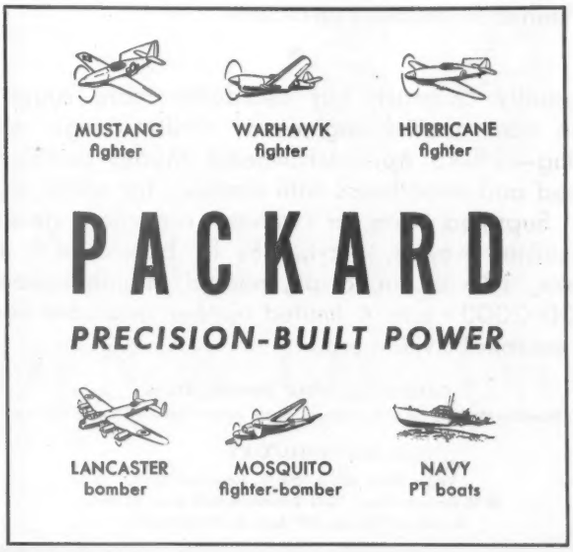
Well, you know what happened. Early in the war, Mosquito fleets demonstrated that the life of a Packard PT engine could safely be extended to 750 hours—a 50 per cent increase.

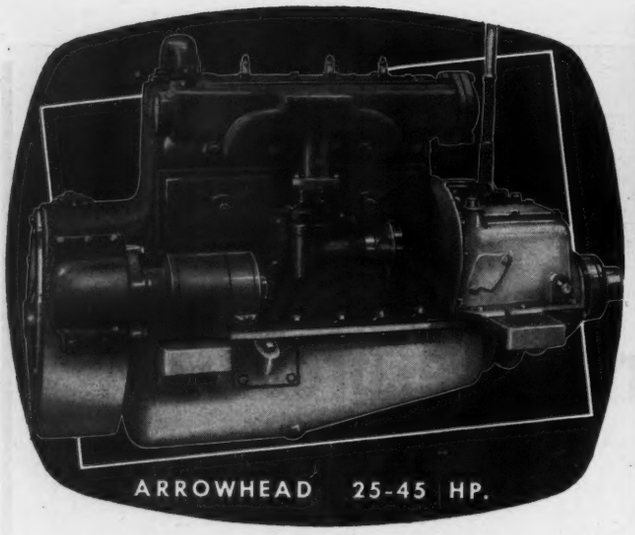
Squadrons operating off North Africa and the Aleutians confirmed this fact. In the South Pacific, it was proved over and over again—often against heart-breaking odds.

And here's the latest flash: Today comes word that many a Packard PT boat engine, along with stepped-up horsepower, is faithfully clocking up 1000 hours, and even more, before it's yanked out of the hull for a general overhaul!

Did we say 500 hours? How wrong we were—and how proud to admit it!

ASK THE MAN WHO OWNS ONE





in wartime...

for U. S. Navy salvage launches, lifeboats, patrol boats . . . standby auxiliary service . . . fishing boats supplying food to U. S. Navy in Iceland. U. S. Army Signal Corps—Communication service.

Red Wing marine ENGINES

in peacetime...

for commercial fishing boats . . . runabouts and cruisers—from 20 to 30 ft. and larger. As auxiliaries, for sailboats up to 50 ft.

●

Unusually compact, but decidedly more rugged than most marine engines of similar range and rating—25-45 hp.—Arrowhead Model combines speed and smoothness with stamina, for wider utility. Supplied with or without reduction gears. Gasoline, 4-cycle, 4-cyl., 3⅝ in. bore x 4½ in. stroke, 186 cu. in. displ., normal engine speeds 1000–2000 r.p.m. *A limited number available now* for essential civilian use.

OTHER *RED WING* ENGINE SIZES
20 Gasoline Models: 8 h.p. to 125 h.p. Spark Diesel Types: 42 h.p. to 125 h.p.

DISTRIBUTORS:
Varier, Eddy, 201 E. 12th St., New York City
W. H. Moreton Corp., 1042 Commonwealth Ave., Boston
Gochenaur Marine, 437 Arch St., Philadelphia

RED WING MOTOR CO., RED WING, MINNESOTA

Perhaps the rubber boat is one version of the post-war tender. Wartime experience has proven its practicality under the most adverse conditions. Armstrong Rubber Co. Photo

will be no different from those built before the war started. The radical change is definitely going to be in power cruisers somewhere between the length of 24′ and 30′."

"The power boats up to about 60′ will probably be mostly of the stock type," is the opinion of Henry Nevins. This point of view is shared by R. E. Reynolds, of The Matthews Company, who reports that "so far we have not worked out anything concrete in the way of a post-war boat, except possibly to pick up where we left off, as the automobile industry will probably do, and carry on from that point to greater and greater refinement. As a matter of fact, in our last series of boats (which was in 1941), we felt we had practically reached the ultimate in fine boat construction, since we did not know where to turn to make new or finer improvements. However, as time marches on, new things are developed which in turn create new possibilities for cruisers of the type we build."

"Machinery has been and will be developed," writes A. W. Talbot, of the Bellingham Boatbuilding Co., "to make all boat construction faster and simpler, thereby cheaper to the consumer. Second, new materials, such as plywood, will expedite construction. Boat instruments and machinery will be further improved for comfort, easy handling and safety."

As far as size is concerned, Ralph E. Winslow is of the opinion that "there will be a great demand for three classes of boats: 1) a small boat, an over-grown dinghy, 20′ to 22′ over all, of light displacement, jib and mainsail rig and with a fin keel. There will be a cuddy cabin with accomodations for two or three persons and a good sized cockpit. The motor will be an outboard. 2) An auxiliary that will vary from 26′ to 30′ o.a. and 20′ to 23′ w.l. with accommodations for three, including a galley and toilet. The rig will be jib and mainsail. Of fairly generous beam and quite seaworthy, it will be able enough to serve as a coastwise cruiser. 3) An auxiliary that will vary from 33′ to 42′ o.a., and from 24′ to 31′ w.l. The rig will be jib and mainsail in the smaller sizes and yawl in the larger. Accommodations will be for four persons, six in an emergency. There is also a demand for a boat that is reasonably shoal; one that can be conveniently used where there is only 4 or 5 feet of water. This makes me believe that more consideration should be given to the centerboard type of boat."

A somewhat different point of view is that of Ralph E. Richmond, of the Quincy Adams Yacht Yard. "The custom built sailing or auxiliary craft up to 72′ o.a. has been our type. It can be branded outright luxury, to be sure, but nevertheless it is the craft that represents the goal of the yachtsman; the realization of years of dreaming, hoping and planning. Such craft have always been built, and always will be built. They can be built only as the product of loving care, and pride of workmanship, by the owner, the architect and the builder. Our thought is that among the pleasure boats of the future will be produced the custom built sailing yacht, still holding its position as the most beautiful of all man's creations."

"The post-war cruising power boat," says Frank Pembroke Huckins, "must be faster than ever before and operable at a lower cost. This is possible only in the planing type of boat. It is accomplished by means of efficient hull form, still lighter construction of greater strength and with engines that are lighter

(Continued on page 113)

STARS in Our Service Flag

On the 166′ ATR's, 135′ YMS Sweepers, 136′ PCs — W-C Bronze Drain Fittings do their duty.

Thousands of Lifeboats, 46′ Army Towboats, CG Picket Boats, rely on W-C Compasses.

W-C Navigation Lights serve on all types of vessels—Navy, Army, Coast Guard, Maritime Commission and craft of the Allied Nations.

You'll see W-C Steerers on 46′ Army Towboats, Navy and CG Picket Boats, and others.

W-C Pumps work aboard 36′ Landing Craft, 63′ Navy Rescue, 33′ Plane Rearming Boats.

166′ ATR's, 103′ APC's, 100′ YT Tugs, 65′ Army F&P Vessels use these W-C Air Ports.

Here we present a few of the many Wilcox-Crittenden products that are now serving on all the Seven Seas, helping to speed the day of total Axis defeat. Despite the grim purpose for which W-C "Dependable" Marine Fittings are being designed and built during the war, we are making our plans for post-war equipment, too. We're preparing for the day when thousands of our friends will look to us again, as boat owners have for a century, confident that our Marine Hardware will serve them well in the comfort, convenience and safety of their pleasure boating. But meanwhile we are manufacturing for Victory!

KEEP ON BUYING U.S. WAR BONDS

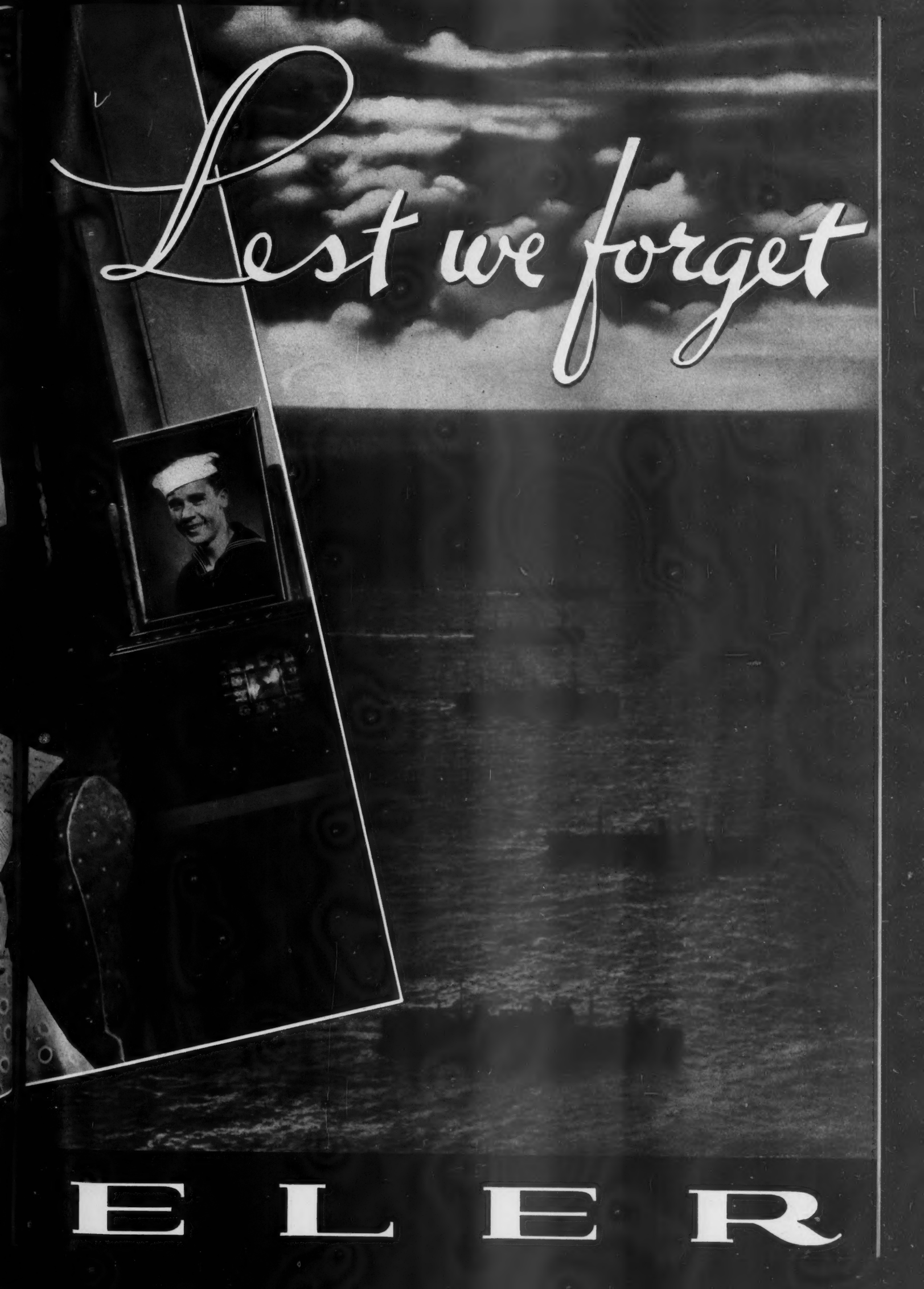
W-C Marine Blowers are on Navy Plane Personnel Boats, Army Eurekas, Amphibians.

WILCOX, CRITTENDEN & CO., INC.

ESTABLISHED 1847

10 South Main Street, Middletown, Connecticut

WHE


Lest we forget
ELER

HOW DO HALL-SCOTTS STAND UP?

Ask The Men That Run Them!

Ask the British how Hall-Scotts performed in the hell of Dunkerque. Ask our Marines about the way they took the landing boats to the beach at Guadalcanal, or through the surf of North Africa. Ask our Coast Guard. Ask our Army and Navy the world around. You'll find three points stressed over and over in their answers—Hall-Scott's dependability, Hall-Scott's sustained power, and Hall-Scott's unrivalled long life in the hardest service.

HALL-SCOTT MOTOR CAR COMPANY

DIVISION OF AMERICAN CAR AND FOUNDRY MOTORS COMPANY, 2850 7th STREET, BERKELEY, CALIFORNIA · NEW YORK BRANCH: 254 WEST 31st STREET · LOS ANGELES BRANCH: 5041 SANTA FE AVENUE · SEATTLE BRANCH: 117-121 YALE AVENUE, NORTH · NEW ENGLAND REPRESENTATIVE: MARINE EQUIPMENT COMPANY, 131 STATE STREET, BOSTON, MASSACHUSETTS

and more efficient." W. H. Millett is an encouraging sort of optimist; he states that "the yacht of the future, as a result of many new developments in materials and power plants, will more nearly approach the 'yachtsman's dream' than ever before." He goes further to say that "in general I feel that she will be far more striking in appearance, have a great deal more speed, combined with a luxury and comfort which was not possible to get at a moderate cost in the past. It may be years before we see really large yachts, but I think there will be some up to 150′ or so, and many from 80′ to 100′ . . . many constructed of welded steel and some of aluminum (alloys)." This last statement will raise not a few eyebrows.

Yachts of the future can embody many ideas which have been learned from the government work in which boat builders have been engaged, is the opinion of Irving Jakobson. "The main problem, as I see it, is to use the materials and the ideas developed in war work in an economical way so that the initial costs of yachts, and their maintenance can be brought down to suit the pocketbook of a greater number of persons. Maybe the production of standard types of boats is the answer. Good boats must be produced at low initial costs and maintenance charges must be low if the sport of yachting is to survive, and those of us who are in the boat building industry must accept this challenge."

W. Whitney Stueck, of the Saybrook Yacht Yard, expresses the belief that as far as design is concerned, there seems to be quite a trend towards light displacement sailing craft for both racing and cruising. "We have been very enthusiastic about light displacement boats for some time," he says, "and hope to turn out some designs . . . of yachts up to 45′ o.a. in length . . . when the war is over." R. T. Miller is directing his thoughts in the same direction, and concludes that "those who love sail . . . will appreciate the trend toward the light-displacement hulls exemplified by the Scharern-Kreuzer (square metre) types so highly developed in the Baltic countries. Small racers also will be fitted with sufficient accommodations to allow their owners to make week-end cruises. Basically, the design of cruising yachts will not change . . . and I believe that motor boat enthusiasts will have a wide variety of rich designs from which to choose."

Both William Smyth and Howard Chapelle sound notes of caution for post-war planners. "I can see," says the former, "a crop of discarded government craft conversions, which will be headaches to yards and owners, as boats built for special purposes just don't 'convert'." Generally speaking, this assertion may be correct, yet there are undoubtedly some types of small warcraft, such as the smaller aircraft rescue boats, which appear to have all the outward characteristics of a pretty attractive cruiser. But their power plants, which are usually much larger than the average yachtsman could afford to be shipmates with, might well present an operational problem. Mr. Chapelle raises two very provocative points. As far as construction is concerned, he believes "that many wartime building techniques may be uneconomical in peace time, thereby limiting anticipated changes. And another thought, there are a large number of yacht owners who are now getting real sea experience . . . and they may come out of the war with entirely new desires and requirements."

\+ + +

There you have it: the post-war yacht in its formative but somewhat hazy outlines. Whereas the anticipated trends are not well defined, as they could not be, they are indicative of the degree of thought and study that is being given the subject by many of the best minds in the world of yachting. And, whether or not you subscribe to any or all of the opinions here expressed, we think you will agree that the demise of both Hitler and Tojo will raise the curtain on an eventful chapter in American yachting.

NEXT MONTH: *The types of construction and the materials employed in the post-war yacht. The comments and reactions of readers to this and subsequent articles in the series will be appreciated by the Editors of* YACHTING.

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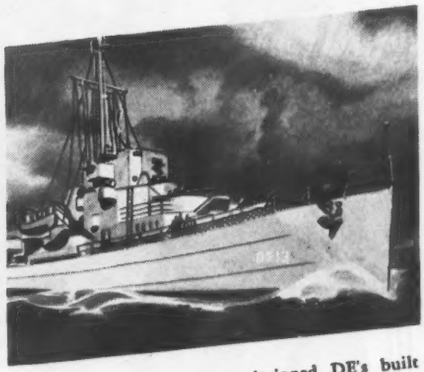

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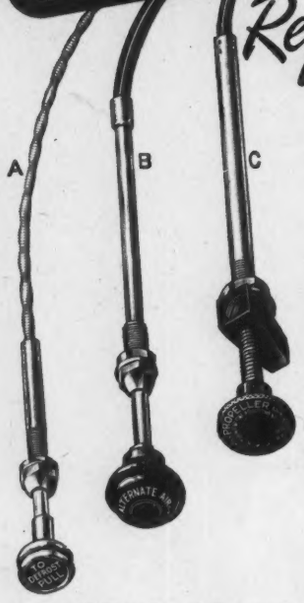

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OUR FIFTEEN-TON DAUGHTER

(Continued from page 52)

none when we bought her and there was no lead or pig iron to be had in all Belize. Then we discovered that the mud around the town hid several piles of great sheets of cast iron. These were old water tanks broken in a bygone hurricane. We paid small boys to dig them up and we hired an enormous man with a sledge hammer to crack them into little pieces. We paid at the rate of one cent for five pounds and we stowed eight-and-a-half tons under the floor boards.

For sails, we bought extra heavy canvas and hired a sailmaker. He was a big brown man with a kindly smile. His methods were somewhat unorthodox: he worked exclusively with string and knots, being highly skeptical of, if not entirely unacquainted with, figures and measurements. To determine the required size of the sails he sent a small boy up the masts with a ball of string. The boy threw the end of the string and the sailmaker stretched it to the appropriate point on the deck or the boom, pulled it taut and tied a knot. The boy then climbed to the next vantage point and again threw the string. The sailmaker tied another knot. After an hour or so, he appeared with an enormous armful of tangled threads like a giant fishnet and said he would be back in two weeks. He was, with a perfectly fitting suit of sails although he worked in a tiny shack nine feet by ten feet in total dimensions; with 300 square yards of canvas, mark you. The only trouble was that the sails when delivered were infested with myriads of bedbugs and had to be fumigated for three days before they could be taken aboard.

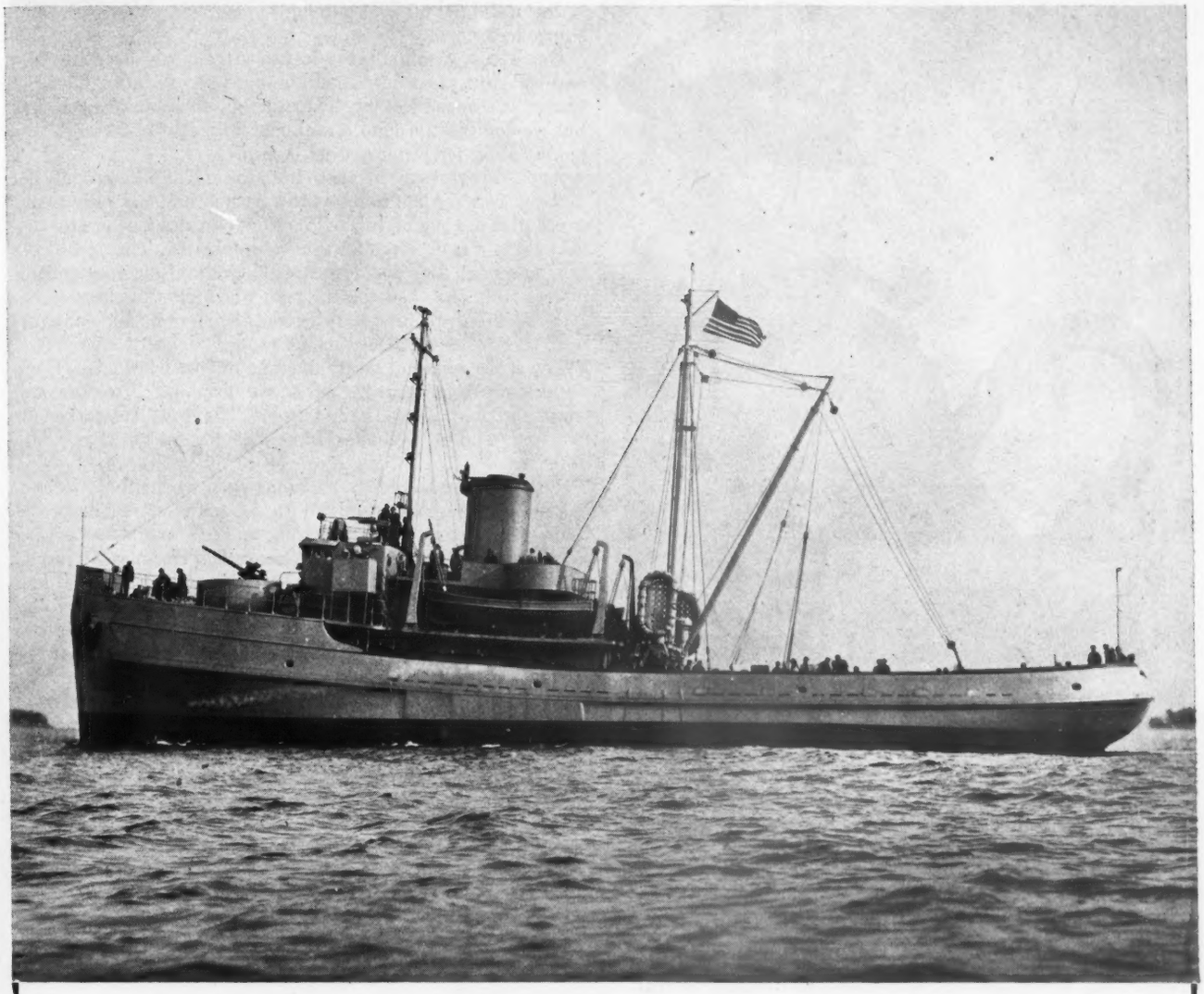
Connecting the wheel with the rudder is a most complicated and costly piece of machinery. It's important, too, because everything depends on it and of all the designs there is only one which a Nova Scotian fisherman will trust himself to; and who encounters heavier weather or knows the sea better than he. It so happened that there was an old Nova Scotian schooner lying in Belize and we naturally coveted her wheel. The owner, happily, cast longing eyes on a big water tank that we owned. After some haggling, I added a small automobile generator to the tank and we did an exchange. A bronze fisherman's wheel in perfect order for two things we didn't want and had to get rid of!

There were no light fixtures suitable for the current from our batteries to be found in the town but somebody got the bright idea that we might acquire a lot of gadgets from a wrecked automobile. We paid five dollars and went to work and the headlights now give powerful but indirect lighting to our cabin, the parking lights to the galley and bathroom, while the dashboard, tail and other sockets and bulbs serve as masthead, riding, port and starboard lights.

There were specific problems. Wooden boats require a large and thoroughly reliable deck pump. Not only may one's life some time depend upon this but it is essential at all times to keep the bilges dry, for all boats seep. There was no whole pump in Belize though we unearthed scores in various stages of disintegration. We were in despair until the engineer's little black boy appeared one day with the monstrous pipe that had served as a funnel when we bought the boat.

Everybody dived at this and in no time a check valve had been salvaged from an abandoned toilet and fixed to one end, a plunger had been fashioned from a brass curtain rod with a cylindrical wood block and raw cowhide washers. A hole was cut in the deck and another through the side of the boat and, when the old funnel had been thrust down into the bilges and securely caulked, we had a fine pump throwing a four-inch stream.

Only one thing really fazed us. Neither Belize nor the good old U.S.A., as appeared from a perusal of catalogs, could offer a refrigerator exactly three feet long and two feet four inches high. It had to be just that size because, by the time we came to this problem, we had filled every other inch of the boat. We tried to make one but it boiled the water instead of freezing it and it leaked horrid gases. To get cold drinks, we have, therefore, had to fall back on an ice box for use in port and on a system of bottles in nets towed astern while at sea.



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But it did not all go according to plan. Oh, indeed no! Awful things happened.

One of the gasoline tanks leaked after it had been installed and we had to tear out a main bulkhead to get at it. Then, of course, it stopped leaking. The other gasoline tank leaked, too, but we had built around it and couldn't get it out at all so we had to use it for water and let it drip.

Somebody stole the magneto from the engine and we could not find another. We had to resort to a battery and coil, only to discover that the engine turned too slowly to run a generator and that there was no room for gearing apparatus. This meant obtaining a small Briggs and Stratton engine and generating plant, but we were soon blessing the man who stole the magneto because we finally realized that we could run a radio and our lights from this excellent little machine.

The stove wouldn't work and was of Swedish make. There were no spare parts to be had so we dismantled two pressure lamps and used their jets and burners. The stove has worked for two years and at all angles, sometimes almost on its end in a beam sea.

But the worst trouble of all came when we finally launched. She promptly began to sink. With the sound of rushing water below, we all dashed about, tearing up floor boards and poking our heads into the more obscure nooks and crannies. It turned out that some bright fellow had left the seacock open and had forgotten to join it to the water intake for the engine by any kind of pipe at all. Furthermore, when this jet of water was gagged, there was still a gushing sound and we found that the caulker had overlooked one whole seam under the stern. The first was fixed with a two foot length of rubber hose begged from a friend's garden; the latter by sending a boy overboard with caulking cotton and putty held in his mouth.

Finally, we sailed. Lights lit, bells rang, water came out of faucets, gasoline, oil, kerosene came out of the right pipes, the rudder steered, the anchor went up and down, even the engine worked and the white sails opened their wings to the Trades. We made our boat go despite the predictions of all our friends, so you may see why I am like all boat owners and why I want to talk about my boat. You will, perhaps, see why I call her our daughter. We put her together, we know every nail in her and we love her.

THE WORLD'S BEST INVESTMENT

(Continued from page 57)

on such boats amounts to approximately 15 per cent after a single season, and perhaps another 5 per cent after the second season, the price then being stabilized for several years. Now, such boats are bringing approximately the same price that they sold for when new. Among recent sales was one of a 35-foot auxiliary which was delivered in 1939 for a price of $4,150. In the autumn of '43, she was sold for $150 less than her original cost. Another auxiliary, of the same over all length but of a different class, was sold by an estate for approximately $200 less than she cost six seasons ago. Such prices are considered not only fair, but reasonable. Somewhat more than the cost-when-new is now being offered and it is hard to find a taker.

The same is true of smaller auxiliaries. According to current reports, profits of 10 to 15 per cent are being offered for boats of a one-design class introduced to Long Island Sound sailors about the same time that Hitler marched into Poland. In fact, the only classes of boats to which buyers are said to be comparatively cool are the smaller racing types, and the explanation probably is that these are essentially racing machines and the youngsters who normally race them are in action elsewhere. But still smaller boats, even unto sailing dinghies, and dinks without benefit of sail, are almost worth their weight in gold. And even at that they are not to be had. When a skipper loses a dink these days, he would, in most instances, prefer the insurance company to provide a good, although not new, tender rather than a check. The situation in dinks, in case you have not already discovered it, is really tight.

So far, this report has been concerned with the comparatively new boat market. How about the old-timers? Normally, their second-hand value holds firm for, after all, an additional year or

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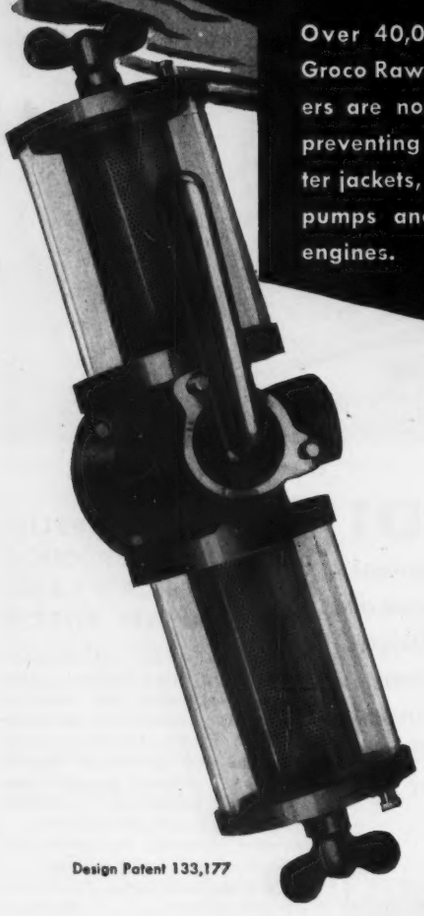

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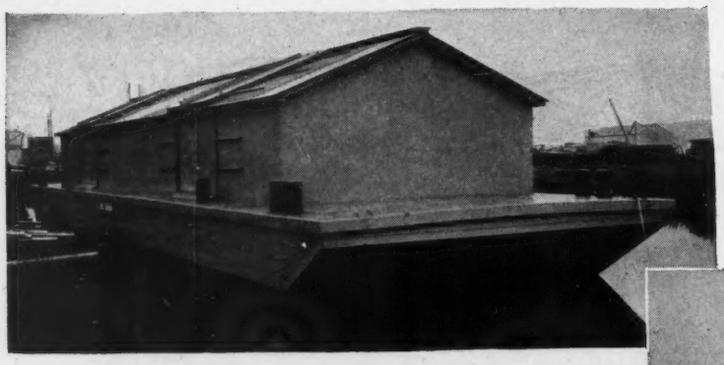


We Are Mighty Proud of Our War Boats

This company and its workers are proud of the great fleet of barges and tow boats it is producing at record speed for our Army and its various types of war craft for our Navy.

When the war ends we will return to the building of yachts and commercial fishing boats. We will also continue to build tow boats and barges for commercial use.

—and Our Post-War Boats

WM. EDGAR JOHN AND ASSOCIATES, INC.

MILTON POINT SHIPYARDS **RYE, N. Y.**

two makes little difference to a good boat that has already weathered ten, twenty, thirty, or even forty years. During war or peace, a twenty-year-old automobile is something that you may have to pay the junkman to take away, but a twenty-year-old boat may be just coming into her own. For those who play around with semantics, there are interesting implications in the fact that the descriptions "second hand" or "used" are never applied to boats. A boat is either sound, or soft, and her condition, more than her age, determines her worth.

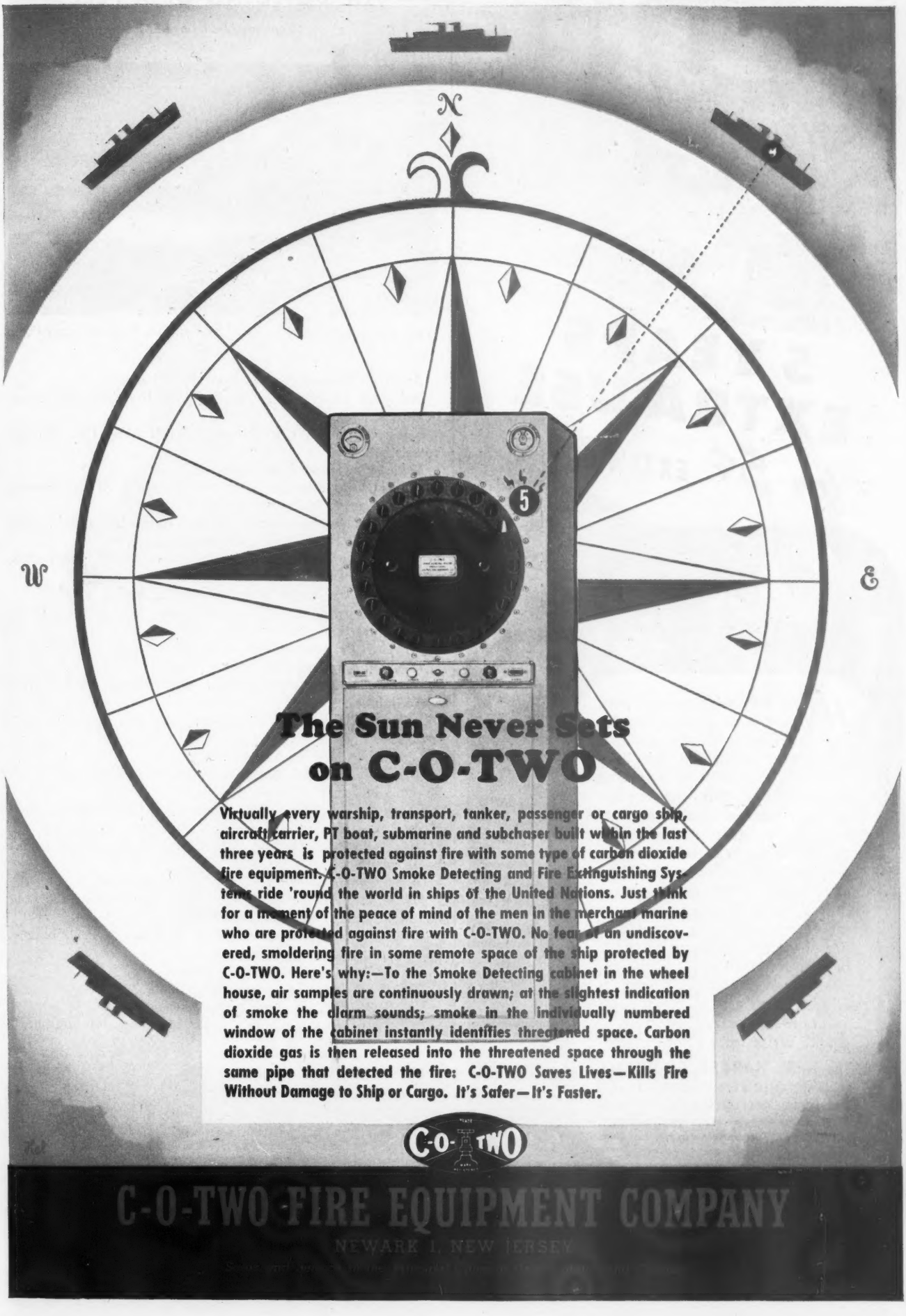
Anyone who has owned boats over a period of years knows this. During normal times, it has not been unknown for an owner to sell his first small boat for an approximation of the price he paid for her, to augment the original capital investment with an amount sufficient to purchase a slightly larger boat, to get as much for her after several year's sailing as he paid in, and to continue with this financial pattern, so that, after each sale, he has in hand — less the amount expended on maintenance — just about the same amount as he invested. In the past, some yachtsmen have done even better and there is little question but that, during the post-war period, almost every yachtsman is going to discover that a boat not only represents a liquid asset but perhaps a profitable one.

Although boats are about the most personal possessions and comparatively few are purchased with the profit element in mind, armchair speculators may find it helpful to have some basis for estimating the cash potentialities of their darlings. Perhaps the most noteworthy example is the price bid over the years for the famous New York "Thirties" built and designed by Herreshoff in 1903, for a cost of $4,200. For many years, the class was actively raced by the original owners and the few which were sold brought good prices. But 1918 was neap tide for the "Thirties." Some of them could be bought for approximately $750. Of course, they still had their original gaff rig, with overhanging boom which required a hefty crew to handle, and neither paid hands nor amateurs were easy to line up. But the men who bought, and waited for better days, hit the jack pot. After the world war, the "Thirties" afforded some of the best of the class racing and, by 1925, they were selling at prices varying between $5,000 and $6,500. This season, when the "Thirties" had passed their fortieth birthday, they were considered good buys at $1,500 and there were few to be had at that price. The indications are that they will bring more next season.

In sizing up the boat situation, you have to get down to fundamentals of our war, and post-war economy. Despite the earnest attempts to check inflation, inflation is here. A dollar isn't worth what it used to be or, stated conversely, things are worth more. This is the reason why leaving money invested in a boat is astute financially and as good an inflation hedge as any an experienced investment counsellor could devise. The value is there and, even though she may have to be laid up for the duration or for part of it, she gives the promise of fair sailing afterwards.

It now appears that peace will be achieved in some theaters of war sooner than in others. This means that there is not going to be any sharp changeover from production for war to production for peace. And, even after the Axis has been completely knocked out, government and commercial contracts may keep the shipyards so busy that the construction of pleasure boats will have to wait altogether, or be undertaken as a side line. Furthermore, and without making any pretense at reading the crystal ball, it appears that automobiles, refrigerators, vacuum cleaners and other so called necessary mechanical gadgets will go into production long before the building of yachts gets under way.

And, all the while, the demand for sailing boats and for power boats will be on the increase. Not only yachtsmen who have returned from the war, and again want to be captains of their own ships, but men who acquired a yen for the sea by going to war, will want boats. After a while, when the big, as well as the small, yards swing into full production, utilizing all the new materials and applying the techniques perfected during wartime, enough boats will be produced to keep pace with demand. But, until then, it looks as though anyone who wants to acquire a boat will have to do his bidding in a seller's market.



The Sun Never Sets on C-O-TWO

Virtually every warship, transport, tanker, passenger or cargo ship, aircraft carrier, PT boat, submarine and subchaser built within the last three years is protected against fire with some type of carbon dioxide fire equipment. C-O-TWO Smoke Detecting and Fire Extinguishing Systems ride 'round the world in ships of the United Nations. Just think for a moment of the peace of mind of the men in the merchant marine who are protected against fire with C-O-TWO. No fear of an undiscovered, smoldering fire in some remote space of the ship protected by C-O-TWO. Here's why:—To the Smoke Detecting cabinet in the wheel house, air samples are continuously drawn; at the slightest indication of smoke the alarm sounds; smoke in the individually numbered window of the cabinet instantly identifies threatened space. Carbon dioxide gas is then released into the threatened space through the same pipe that detected the fire: C-O-TWO Saves Lives—Kills Fire Without Damage to Ship or Cargo. It's Safer—It's Faster.

C-O-TWO

C-O-TWO FIRE EQUIPMENT COMPANY

NEWARK 1, NEW JERSEY

5 YEARS EXTRA USE for 5¢ EXTRA COST!

HARPER fastenings add years and years to the service life of products and equipment on which they are used . . . and do it at a trifling extra first cost. They insure your product against the ravages of rust and corrosion. They resist numerous acids and alkalies . . . ocean salt . . . tropic sweat. They save hours of time and labor required to replace rusted common steel bolts . . . prevent failure of vital equipment . . . keep production rolling . . . are repeatedly removable. In certain alloys they are non-magnetic and non-sparking. 4320 items in stock. Write for 4 color catalog.

The H. M. HARPER COMPANY
2640 FLETCHER ST. • CHICAGO 18, ILL.
BRANCH OFFICES: New York City, Philadelphia, Los Angeles, Houston, Cincinnati, Milwaukee. Representatives in Principal Cities

Brass
Bronze
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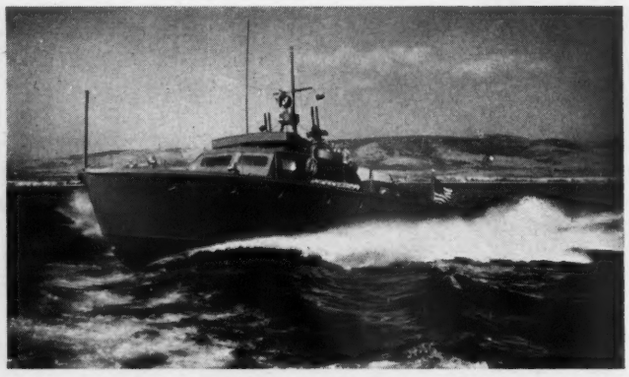
Monel
Stainless

HARPER
EVERLASTING FASTENINGS

THE BUILDING OF A FLEET

(Continued from page 56)



A Harbor Boat Building Co. "63" on her trials. Kent Hitchcock Photo

American Hoist & Derrick Co.: Crane barges.

Birchfield Boiler, Inc. (Shipbuilding Division): 99′ cargo boats, 85′ tugs.

Bellingham Marine Railway & Boatbuilding Co.: Salvage vessels.

Brewster's Shipyard: 46′ towboats.

Burger Boat Company: YMS minesweepers, SC subchasers, PCS subchasers, 165′ rescue tugs.

Cambridge Shipbuilders: 83′ aircraft rescue boats, 65′ freight and passenger boats, 140′ wood freight boats.

Consolidated Shipbuilding Co.: Landing craft, PC subchasers, 86′ tugs.

Dunphy Boat Co.: 24′ plane retrieving yawls.

Dravo Corporation: DE patrol vessels, LST landing craft, crane barges.

Harris & Parsons: SC subchasers.

Jakobson Shipyard: Tugboats.

Wm. Edgar John & Associates: 46′ towboats, deck barges, cargo lighters.

Jeffersonville Boat & Machinery Co.: LST landing craft, towboats.

Lyman Boat Works: Assault boats.

Levingston Shipbuilding Co.: Gasoline tankers; 162′, 74′, 85′, and 143′ tugs.

Henry B. Hinckley & Co.: Mine yawls, picket boats, towboats.

Oxford Boatyard Co.: 36′ aircraft rescue boats, 45′ picket boats, plane rearming boats.

Owens Yacht Company: 42′ aircraft rescue boats.

Minneford Yacht Yard, Inc.: 140′ cargo vessels, 126′ tug boats, 65′ freight and passenger boats.

Northeast Shipbuilding Co.: 110′ deck cargo B.C. barges, 46′ towboats, 126′ tugs.

Pacific Boat Co.: 130′ and 110 barges.

Penn Yan Boats: 18′ power utility boats.

The Peyton Co.: 96′ cargo and passenger vessels.

Richardson Boat Co.: 40′ motor launches, landing craft.

An outboard-propelled LCR (Landing craft, rubber). Official USN Photo

At present our 500 workers and our entire facilities are producing minesweepers and Navy tugs.

BUY MORE WAR BONDS AND STAMPS . . . NOW

BORN WITH SALT AIR IN HIS LUNGS

Paul Luke, Superintendent of Hull Construction, was born right here in Boothbay. He operated his own yard before Pearl Harbor where he built such fine sailing yachts as the Astral. He helped build the schooner Sewanna, chosen by President Roosevelt for his cruise along the New England coast before the war.

Paul Luke came by his knowledge of shipbuilding the hard and thorough way. He is typical of the men, in many ship yards, who are building our Navy to Victory strength!

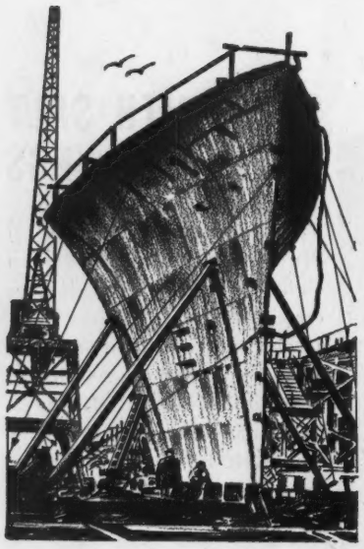
FRANK L. SAMPLE, JR., Inc.

★ *Shipbuilders* ★

BOOTHBAY HARBOR, MAINE

Complete Modern Facilities for Designing, Building, Storing and Reconditioning Yachts and Commercial Vessels up to 200 feet

Member of: Maine Boatbuilders and Repairers Association, *and* Atlantic Coast Boat Builders and Repairers Ass'n., Inc.



Ships IN SECTIONS

EVEN large ships are built "in sections", at the LEATHEM D. SMITH Shipbuilding Company yards. In this day of speed and rapidly developing technique in shipbuilding, there is nothing particularly startling in the fact. But back of it lies the SMITH ability "to do".

Whether it is a modern frigate section, as shown in the above illustration, or whether it will be one of your new streamlined products after the war, the same SMITH ability "to do" is yours to command. For after the war, the SMITH organization will turn toward peacetime efforts, bringing with it all the skill and ability acquired in building fighting ships for Uncle Sam.

★

If you have an "after the war" manufacturing problem, bring it now to the LEATHEM D. SMITH organization and perhaps we can solve it for you.

The largest little shipyard ...on the GREAT LAKES

LEATHEM D. SMITH SHIPBUILDING COMPANY

Sturgeon Bay Wisconsin

★

Saybrook Yacht Yard.: 45′ picket boats.

Skaneateles Boats, Inc.: M-2 assault boats.

Leathem D. Smith Shipbuilding Co.: 56′ tugs, PC subchasers, YN net tenders, cargo vessels, frigates.

Stephens Brothers, Inc.: 100′ aircraft rescue boats, 72′ tug boats.

Sturgeon Bay Shipbuilding & Drydock Co.: 150′ retrieving vessels, 99′ cargo boats, 45′ motor tenders, 176′ supply vessels.

Tregoning Boat Co.: Lifeboats, life rafts.

United Boat Service Corp.: 50′ landing boats, 74′ tugs.

Ventnor Boat Works, Inc.: 100′ aircraft rescue boats.

Wilmington Boat Works, Inc.: 96′ freight and passenger boats, 85′ aircraft rescue boats.

Wilson Co.: 50′ motor sailers, 46′ towboats, 24′ plane personnel boats.

Wisconsin Bridge & Iron Co.: 104′ combination k.d. barges.

Gar Wood Industries: 46′ tow boats.

ENGINE MANUFACTURERS:

The Buckeye Machine Co.: Auxiliary Diesels and generating units, for installations in tugs.

Chrysler Corporation: Ace, Crown, Royal, Twin Marine, Marine Diesel and the "Sea Mule" marine tug.

Cummins Engine Co.: Four models of Marine Diesels ranging from 33 to 250 hp.; Marine-Diesel electric generating sets.

Gray Marine Motor Co.: Model "Four-52"; installed in Penn-Yan 16-footer.

Hall-Scott Motor Car Co.: Defender model; installed in PTs, aircraft rescue, landing and patrol boats.

Johnson Motors: Outboards; installed on bridge and ferry pontons.

Kermath Manufacturing Co.: 225 hp. "Sea Wolf"; installed in Higgins landing boats; 550 hp. "Sea Raider Special"; installed in 100′ aircraft rescue boats; 500 hp. "Sea Raider"; installed in "J" boats; 250 hp. "Sea Raider Six"; installed in 42′ aircraft rescue boats; 550 hp. "Sea Raider Special"; installed in 45′ aircraft rescue boats; 225 hp. "Sea Wolf"; installed in 38′ picket boats; 4–226 60–65 hp. Diesel; installed in 26′ mine laying yawls; 1000 hp. tandem units; installed in 63′ aircraft rescue boats.

The National Supply Co.: Four-cycle Diesels of various sizes and hp.; installed in Army tugs and cargo vessels.

Packard Motor Car Co.: 4M-2500 engine; installed in 85′ and 104′ aircraft rescue boats, as well as in all types of PTs — American, British, Russian, Dutch and Canadian.

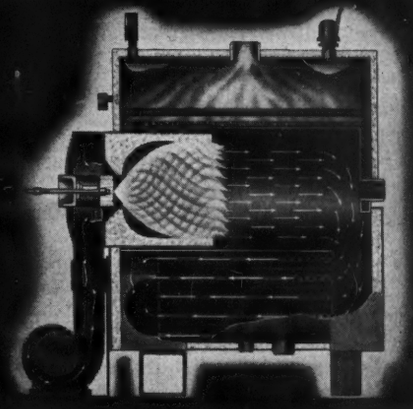
The Army's outboard propelled boats, although light, take heavy loads and rough treatment. Below, "hitting" the beach. Evinrude Photo

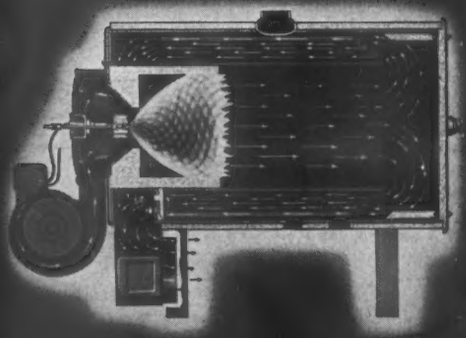
MARINE BOILERS WATER HEATERS

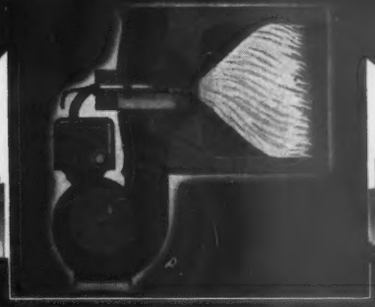
GAR WOOD GW HEATING EQUIPMENT

HEATING TYPE
STEAM OR WATER
4 Models

MARINE AND
COMMERCIAL TYPE
3 Models



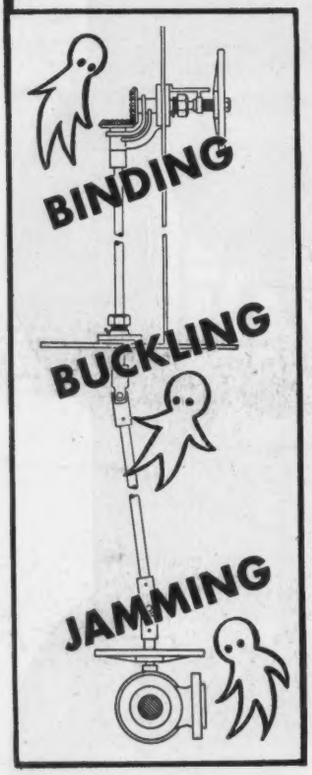


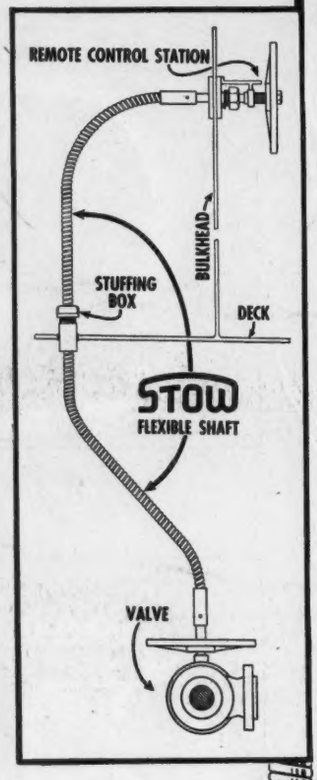


GAR WOOD HEATING DIVISION

GAR WOOD INDUSTRIES, INC. DETROIT 11, MICHIGAN

STOW
REMOTE CONTROL
FLEXIBLE SHAFTS
come through in the Pinches!





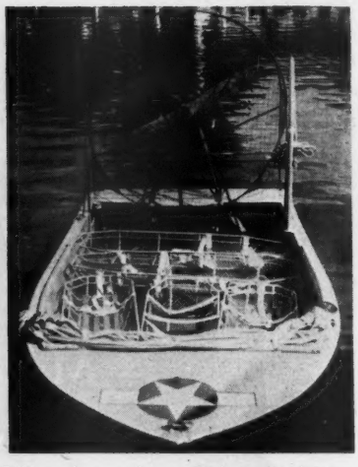
Gremlin Exterminator!

● Stow Flexible Shafts for remote controls are completely dependable to withstand, not only the stresses of normal marine service, but the much greater emergency strains from impact and shifting of cargo.

● Stow Flexible Shafts eliminate the old system of reach rods—plus universal joints—plus gears—plus bearings—that was so constantly vulnerable. They are made in a single continuous, protected unit, ready for simple, time-saving installation. They remain in efficient working condition for long periods with no need for adjustment or attention!

● Stow invented the flexible shaft and has pioneered many of its marine and industrial applications. Write today for complete engineering data. It's based on Stow's know-how in flexible shafting design and manufacture throughout 68 years of leadership.

STOW MANUFACTURING CO.
37 Shear St., Binghamton, N. Y.
Inventors and Developers of Flexible Shafting



Left, a Richardson-built 36′ LCVP on her trial run. Right, a Paul Prigg shallow-draft, air-driven rescue boat. They have large cockpit space

Palmer Bros. Engines, Inc.: LLH model; installed in 24′ lifeboats.

Scripps Motor Co.: 300 hp. V-12; installed in 36′ landing craft; 95 hp. V-8; installed in 42′ landing craft; 225 hp. 6-cyl.; installed in 36′ landing craft; 200 hp. 6-cyl.; installed in 36′ landing craft.

Witte Engine Works: 9 hp.; installed in lifeboats up to 45′.

The Vimalert Co.: V-1150–1 model, developing 400 hp. at 2300 r.p.m.; for installation in Coast Guard vessels.

EQUIPMENT MANUFACTURERS:

American Chemical Paint Co.: Rust removing chemicals for Army and Navy installations.

Ahrens Controls, Inc.: Flexible and rigid controls for throttle, choke, spark, vents; lever units, locking and vernier adjustment units for these controls. Dura-grooms, which are used in forming a water-and-fume-tight support for cables and lines passing through bulkheads and firewalls.

Blackmer Pump Co.: Rotary hand and power pumps for marine use.

L. S. Brach Mfg. Co.: Marine antennae and mounts; for installation on PTs and amphibian tanks.

G. C. Breidert Co.: Marine Air-X-Hauster; for all types of ships.

Cannon Electric Development Co.: Connectors for ship-to-shore or dock electrical connections or in any radio transmitters.

The Carlisle & Finch Co.: Marine searchlights and floodlights.

Catalin Corporation: Engine room order indicators and dials; translucent order indicator dial drums; throttle quadrants and lever knobs; cast resin parts for under-water sound devices; dim-out transparent colored discs.

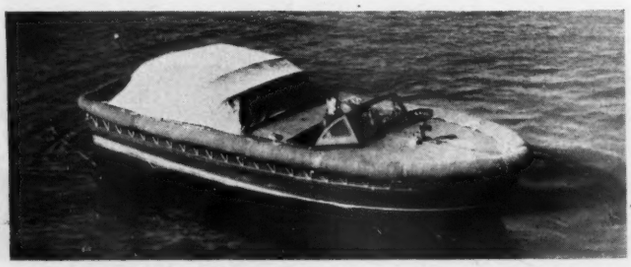
Croft Steel Products, Inc.: Airports; ventilating deadlights; airscoops; rigging fittings; cowl ventilators; manholes; towing bitts; steering gear assemblies; non-water-tight doors; garbage chutes.

Chrysler Corp. (Airtemp Division): Refrigeration condensing units; refrigeration systems; self-contained "reach-in" refrigerators.

R. S. Danforth: Anchors.

Davis Square Mattress Co.: Mattresses, pillows and cushions.

Electronic Laboratories, Inc.: Vibrator power supplies for



One of the Lyman-built 24′ plane personnel boats for the Navy

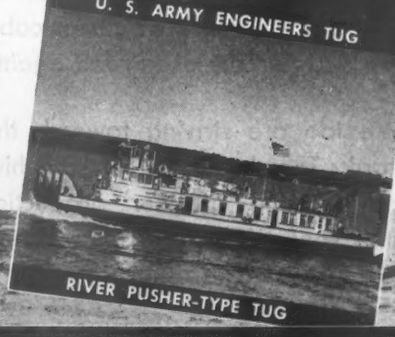
Specialists

IN DESIGN • SHIPBUILDING • MAINTENANCE • REPAIR

U. S. ARMY CARGO VESSEL

U. S. ARMY DISTRIBUTION BOX BOAT

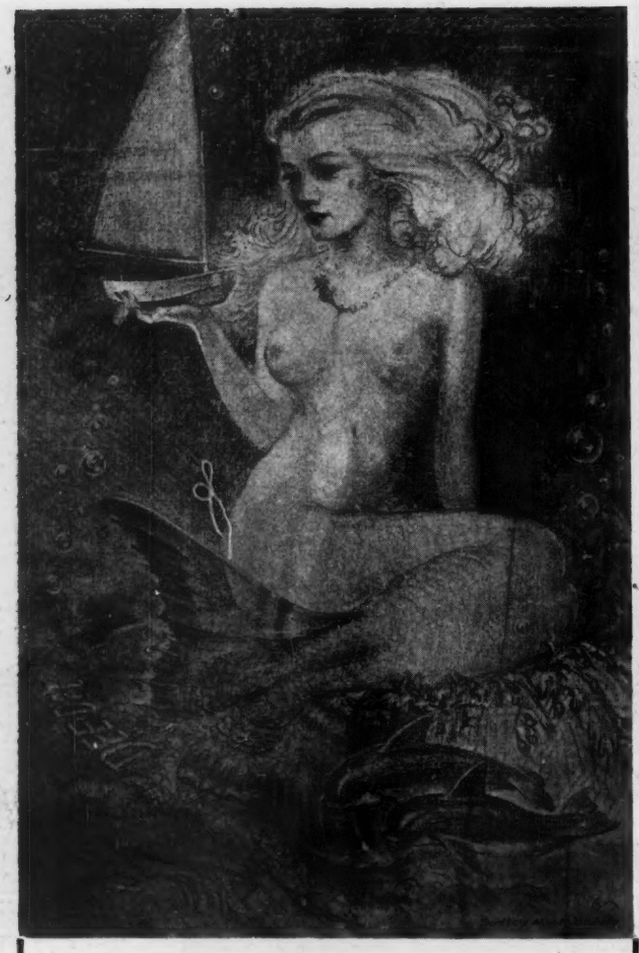
U. S. ARMY ENGINEERS TUG


RIVER PUSHER-TYPE TUG

For war and commerce

Years of experience in every phase of shipbuilding and ship care has earned for us an enviable reputation. Today, we have a large amount of "know-how" at our fingertips that is solving marine problems not only for the U. S. Army . . . but for commercial and private boat owners as well. However, we don't rest on our laurels. Our engineers and designers are working steadily at new and improved methods and designs — All of which will prove amazingly new to the boating world at large when the war is won.

STURGEON BAY SHIPBUILDING & DRY DOCK COMPANY • STURGEON BAY • WISCONSIN



"DEE DEE" PRESENTS OUR

DYER DHOW

TODAY we are building these for use by the Army and Navy on Aircraft Rescue Boats, subchasers and those amazing P.T.'s whose sting is felt around the world.

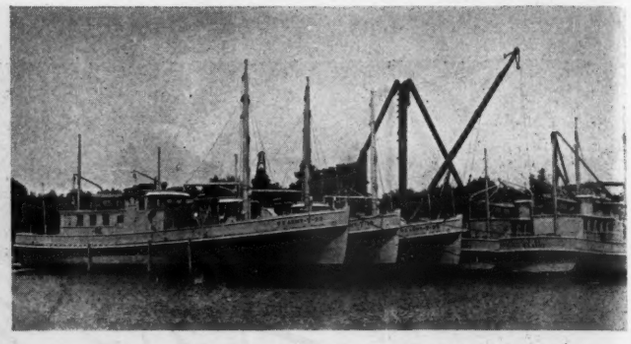
WAR BONDS that you BUY NOW will speed "THE DAY" when you can slide your DYER DHOW or DYER DINK atop your car or cabin top and "*hit the open road again.*"

We too are striving towards this goal. The hundreds of dinghies now coming off our production lines spell better boats for tomorrow's post-war days.

"Keep 'Em Sailing"

THE ANCHORAGE · INC

WARREN ■ RHODE ISLAND



Army T type tugs at the outfitting basin of M. M. Davis & Son

the operation of radio equipment, lighting equipment and electric motor operation.

Farrel-Birmingham Company, Inc.: Rolls; castings; heavy machinery; gears and gear drives.

The Flintkote Co.: Lightweight fireproof decking.

General Electric Plastics Divisions: Stern tube and rudder bearing liners; name and instruction plates.

Herschel Engineering & Supply Co.: Laminated plastic marine bearings; laminated plastic pump valves and piston rings.

Jefferson-Travis Radio Mfg. Corp.: Two-way radio communication equipment.

Marine Products Co.: Throttle and clutch controls; centrifugal bilge pumps.

Modine Manufacturing Co.: Unit, connection and ventilation heaters.

National Foam System, Inc.: Chemical and mechanical foam fire protection equipment.

Pesco Products Co.: Fuel pumps for PTs; special oil and bilge pumps; hydraulic units for marine applications.

Philco Corporation — Storage Battery Division: Storage batteries.

Schwarze Electric Co.: Marine bell, buzzer and horn signals.

Seaporcel Corporation: Joiner bulkheads and other accessories.

The Sparks-Withington Co.: Warning signals.

Stewart-Warner Corp.: Instrument panels; tachometers; gauges; warning switches.

Heater Division — Stewart-Warner Corp.: Hermetic combustion heaters for use as cabin and compartment heaters on PTs.

Stow Manufacturing Co.: Flexible shafts for various marine uses.

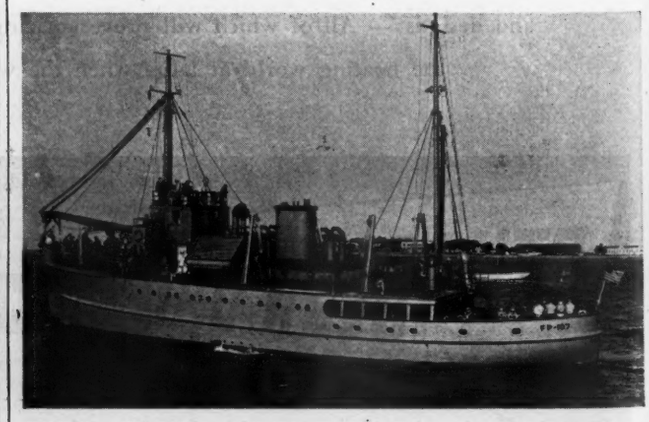
United States Plywood Corp.: One-piece hulls, molded of Weldwood plywood, for 25-ton Army ponton boats; flat Weldwood for all types of assault and landing boats; Weldwood glue.

Viking Pump Co.: Fire, bilge, fuel, lube, fuel transfer and cargo unloading pumps.

E. B. Wiggins Oil Tool Co.: Quick couplings.

E. J. Willis Co.: Kerosene stoves and heaters; fuel tank fittings; voice tube equipment; blowers; rubber bearings.

Yeomans Brothers Co.: Drainage and sewage expelsors; close-coupled horizontal pumps.



Minneford Yacht Yard has built numerous FP vessels. Rosenfeld Photo

Withstanding waves of terrific assaults, with a strength and durability almost unbelievable ... IPIK PLYWOOD is proving itself on the toughest testing grounds the world has ever known..

We, at IPIK, have studied many long years learning the qualities of various woods . . . experimenting in new ways of cutting and finishing . . . of using many bonding agents, from simple glues to the newest plastics, such as TEGO, now used in our lamination processes . . . until today . . . we are qualified experts in the mass production of superior wood finishes . . . in fabricating the world's finest woods into IPIK PLYWOOD, famous for its EXTRA strength, durability and beauty.

Further experience . . . on the home front . . . proves that IPIK PLYWOOD is now ready for its part in the gigantic task of rebuilding and rehabilitating the world . . . *a <u>better world</u>* . . . when once more peace and good will inherit the earth. *<u>Today</u>, as <u>when</u> <u>peace comes</u>*, remember one of America's greatest manufacturers of fine wood finishes. . . .

IPIK

GUM ★ POPLAR ★ MAHOGANY

PLYWOOD

IPIK PLYWOOD COMPANY

1203 Canal Building, New Orleans, La. ★ ACTORY AT [illegible]

Bonds Are Buying Her—Universal Will Power Her!

Yes, we're buying her, now. "Lark II" is her name. And a real cruiser she's going to be — sweet, sleek and seaworthy.

She's on paper and already half paid-for — with War Bonds. And every month she comes closer to being ours — closer in two ways. First, the money we put in Bonds *today* helps buy the guns and ammunition that are bringing peace closer. And then, with each new War Bond, "Lark II" is nearer to being paid for — in full.

Of course, our postwar plans include a Universal 100% marine motor. I've been around boats long enough to know that for marine service, a motor should be *built* for the sea — *not converted* for it. To me that means just one thing — *Universal*.

Universal 100% MARINE MOTORS

Universal Motor Co. KEEP BUYING U. S. WAR BONDS

312 Universal Drive, New York, New York ▪ 44 Warren Street, New York, New York

THE WORLD'S LARGEST BUILDERS OF 100% MARINE MOTORS

Their work has helped make it possible That Free Men Are Sailing Free Seas Again

110' WOODEN SUBCHASER, 'CINDERELLA OF THE FLEET

SO that free men might sail free seas again . . . undersea raiders, who were preying upon men and ships of freedom-loving nations, had to be forced to the surface, or to the bottom — captured, or destroyed forever.

Helped by other members of the team, planes, blimps, and larger ships, the 110' subchaser has done her part in overcoming the submarine menace, a job almost completely accomplished.

Here at Elizabeth City we are proud of the part we are able to play in the War for Freedom, building these sturdy wooden ships — a part that we would be unable to play today had it not been for the experience gained in past years through our work with many yachts and commercial craft.

But, proud as we are of our present job, we are eagerly looking forward to again building, servicing and repairing for you yachtsmen.

BUY MORE WAR BONDS

Elizabeth City Shipyard

ELIZABETH CITY, NORTH CAROLINA

THE SEXTANT CASE

(Continued from page 60)

was doing it, who the instructor of the navigation class was, how he could be reached, etc., etc. When he finished, I said, "Well, now you know it is all right, I'd really like to take those sights. How can I do it, Mr. Brown?"

He suggested that I see the Captain of the port. So the next morning I started out. When I arrived, the sentry at the gate had me escorted to an office where I had to state my business. From there, a second escort took me half way down the yard to another building where I again told my business to a sailor who was typewriting in an outer office. Eventually, I got in to see the Captain of the port, a lean, serious person, whose one sign of emotion was a gleam of amusement when I told him I'd gotten into considerable difficulty trying to take sights without credentials before a Sunday morning crowd at Sandy Beach. It had been suggested that I get in touch with him about it.

I admitted that one of the sailors had said my sight-taking was different from any he'd ever seen but, in working them up, I'd found one that was only 1/10 of a mile off and that looked all right to me.

"That was *very* good," said the Captain. "What sights do you want to get?"

"Stars especially."

"But they put everyone off the beach at night."

I said I'd been told that if I computed the altitudes in advance and set the sextant accordingly, I could, perhaps, pick up the stars on the horizon, seeing them through the telescope before it got dark. I wasn't sure, but had in mind trying it.

He agreed that I might be able to. If, after checking everything, he found it O.K., and someone known to him would vouch for me, he would give me a letter stating that I was taking sights required for a course in celestial navigation. This would probably fix things up. Policeman Brown would be perfectly satisfactory as a reference-giver.

Elated at the prospect of being allowed to complete the summer's assignment upon due proof that public safety would not be endangered, I went home and called Archie Brown at the station. He said I'd have to have the chief's O.K. first but I could talk to the chief about it right then.

"It's the Sextant Case," I heard him say as he passed along the call.

The chief turned me down. "We can't be too careful, Miss Bowditch," he explained, "we're continually running into queer things around here."

"But my activities are so innocent —"

"Even so, we've had to report them to certain quarters. Besides, two hundred or more people down in the beach section are coöperating by notifying us of anything that looks suspicious. Every time you appeared with a sextant, the police station would be swamped with telephone calls."

I gave up then.

A week's inactivity followed, during which I not only did not take the sextant to the beach but did not even take it out of its box. Then, noting that a meridian transit of the moon would occur at $7^h\ 16^m\ 6^s$ today, I decided to take an artificial horizon sight of it in our own back yard. No one would be interested in what went on there and, besides, no one would be around that early in the morning to see.

So I fixed up a pan of molasses for a reflecting surface and put it out in the grass, placed the watch, pencil and notebook on a convenient ash can and got busy with the sextant. Anne came out and stood beside me. Bye and bye, she began to laugh quietly. I finished the sights, then said, "What were you laughing at?"

"The Naval Officer who rents Winter's garage just came after his car," she replied, "and was he *looking at you!*"

Affectionately,

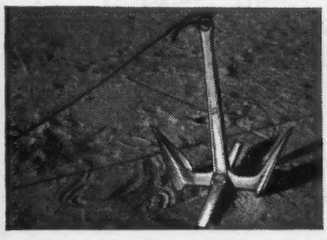
MARY B.

P.S. Sister Jean called from uptown a minute ago to say, "I thought you might be interested to know about our new neighbor right across the street. He's an FBI man and he is moving in today."

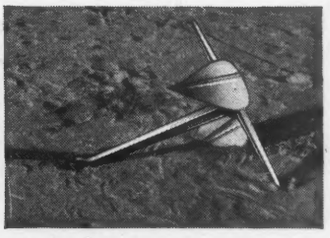
SCIENTIFIC DESIGN PROVIDES THE ADVANTAGE

. . . greater fighting power for ships

. . . increased holding power for anchors



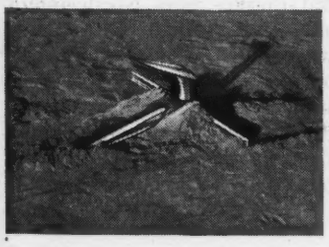
1. A slight pull and fluke, shank and stock arm points all contact the bottom simultaneously.



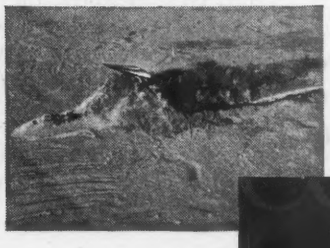
2. The pitch of the fluke blade compels it to dig down instantly and automatically.

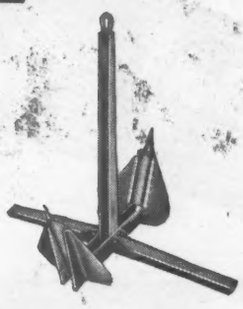
THE MODERN ANCHOR IN ACTION

3. Anchor is now parallel to bottom. Stock arms begin second function—added holding power.



4. All holding parts completely "hooked"...buried within five feet of original starting position!





Many more knots per hour . . . scores more guns and better ones . . . amazing navigation, communication, range-finding devices. It's American *designing* genius that keeps our fighting craft in the lead.

An example is the modern anchor designed by Northill which *cuts anchor weight as much as 85%* —yet *boosts holding power up to 60:1!*

Result: U. S. Navy, Coast Guard and Air Corps boats today get the advantages of smaller, lighter anchors—faster and easier to handle. And unsurpassed in holding power.

Designing like this continues at Northill—not only on anchors, but on other vital marine products. They will come to you in the postwar future —newer and more advanced because they bear the mark . . .

Northill Anchors are still available to members of the Coast Guard Auxiliary and to commercial fishermen at Ship Chandlers and Marine Supply Dealers.

If you do not qualify now, list your name for a postwar Northill. It will be well worth waiting for.

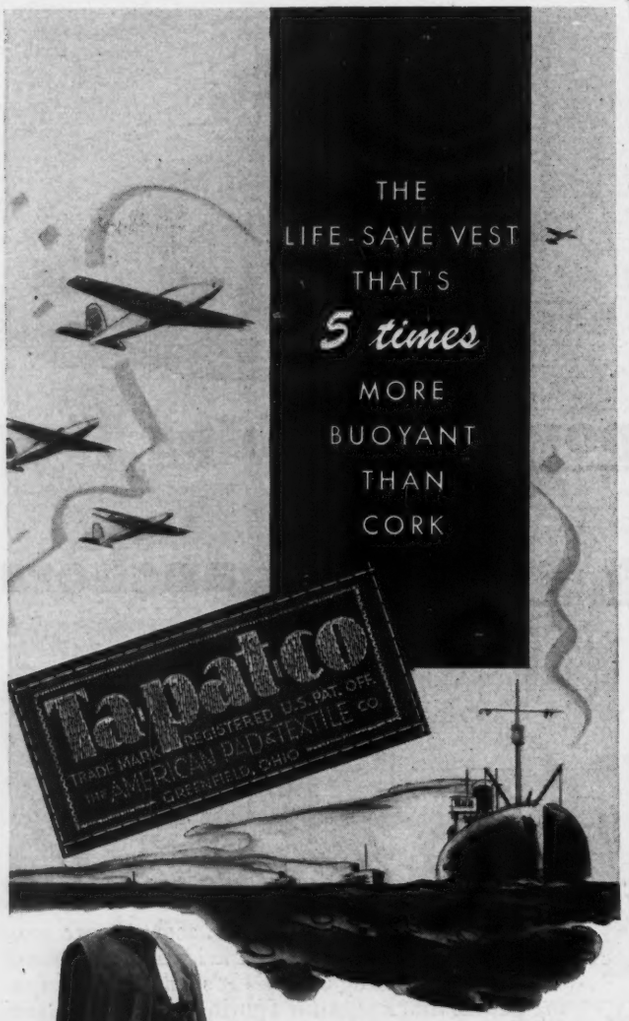
designed by

Northill

Northill Company, Inc., Subsidiary of The Garrett Corporation, Los Angeles, Calif.

FREE! at Ship Chandlers and Marine Supply Dealers

"The Anchoring Handbook" is a complete and authoritative guidebook on anchoring problems and techniques. Twenty-eight fully illustrated pages, it tells how to figure holding power... how to choose anchorage. Gives merits of rope vs chain plus scores of other tips for safer anchoring. Ask for *free* copy today.



» » **Our armed forces, and Merchant Marine, have the protection of Life-Save equipment *that never lets them down!* Snags, cuts, tears... even bullets can't sink this kapok filled life-save vest. Light-weight, soft and comfortable to wear, it not only furnishes a wide margin of safety in buoyancy, but provides cushioned protection against jolts and floating wreckage. The peace-time role of this famous Ta-Pat-Co life-save equipment will be in providing safety with comfort for maritime workers and all who love water sports.**

WHEN PEACE COMES!

TA-PAT-CO STAY-A-FLOAT HAS GONE TO WAR

Thousands of unfilled orders for STAY-A-FLOAT were on hand when our factories went exclusively on war work. When peace-time returns this famous patented life-save and swim-vest will again make water sports safe for young America.

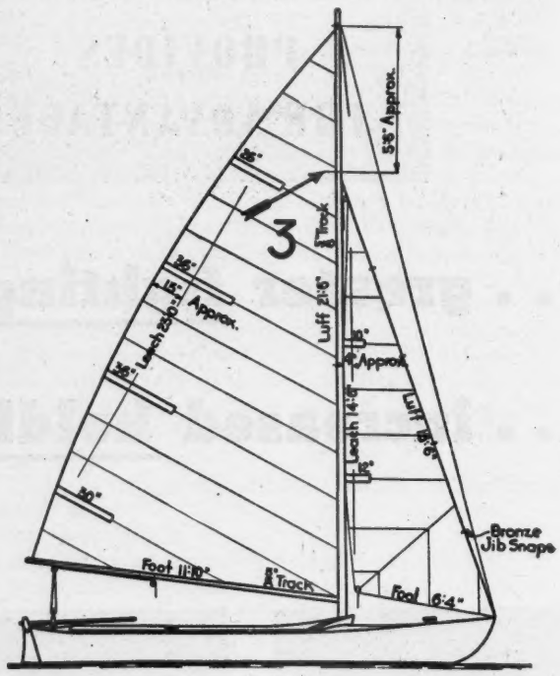
NOTE: The kapok in Ta-pat-co life preservers is a critical material reserved for the use of our fighting forces for the duration.

THE AMERICAN PAD & TEXTILE COMPANY
GREENFIELD ★ OHIO

In peace and in war, the leading manufacturer of Life-Save Equipment and Sleeping Bags

THE LAKE MICHIGAN ARROW FLEET

(Continued from page 65)

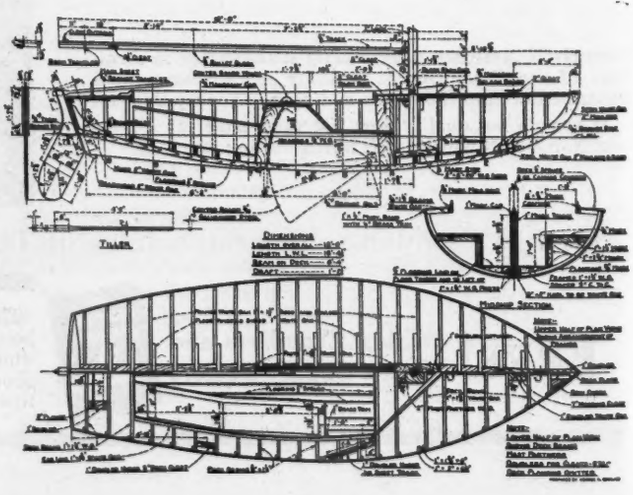


fering husbands acting as crews, have brought out as many as fifteen contestants. Incidentally, the handling of the boats is creditable. The Montrose Harbor Fleet, which had eleven boats in commission last season, has been racing for three years. Interfleet races have added much interest to the summer's schedule.

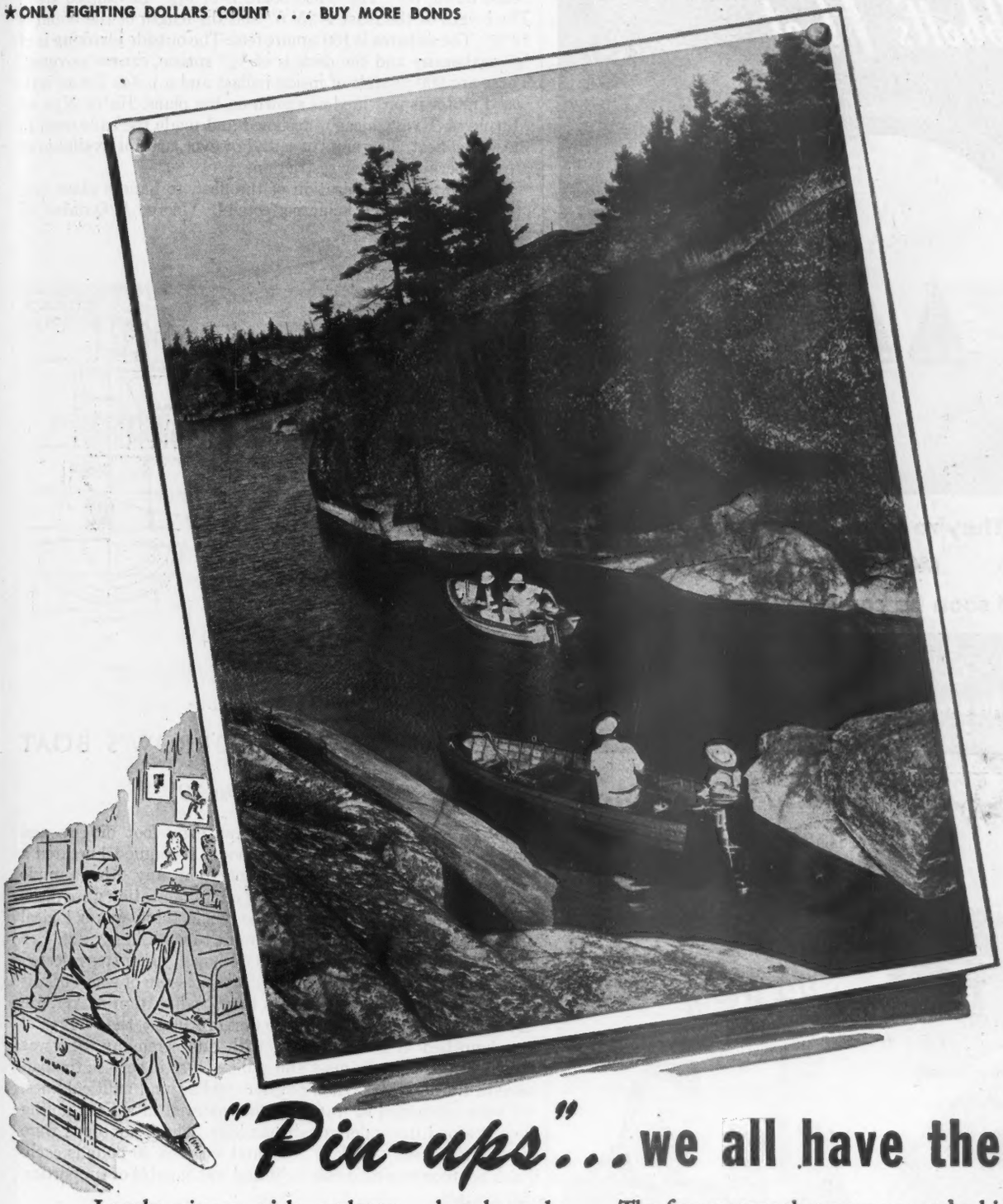
Being a light displacement boat, the Arrow may be handled easily on a trailer and, before the war, many a skipper took his boat up into northern Michigan to use during his vacation. She is an excellent boat for family use since the cockpit is large enough to seat six persons comfortably.

Experience has shown that a crew of three or four is best for average conditions on Lake Michigan. Only in extremely light airs can two persons race an Arrow effectively. In the search for good crew members, the Naval Ensigns from Northwestern University, as well as members of the United States Coast Guard Reserve (Temporary), were invited to sail. Besides helping out the skippers of the Arrow fleet, this afforded an excellent opportunity to train these young men in handling small boats.

George A. Quinlan has brought the Arrow plans and specifications up to date in a manner which will make exact duplication possible. The general dimensions are as follows: Length over all,



★ONLY FIGHTING DOLLARS COUNT . . . BUY MORE BONDS



"Pin-ups"...we all have them!

Lovely pin-up girls a-plenty... but barrack walls can't hold all the pictures a soldier sees. Beyond are other scenes... perhaps of that winding inlet, blue and silent... the big grey rocks topped with pines against the sky... the bass that smashed and fought like fury... *"Man, oh man . . . when I get back!"*

In fox-hole or gun turret... or at bench, machine or desk... we all have our "pin-ups". Things we've enjoyed before and that we're going to enjoy again. Mental pictures that to each of us satisfyingly symbolizes the freedom that America is fighting and working for.

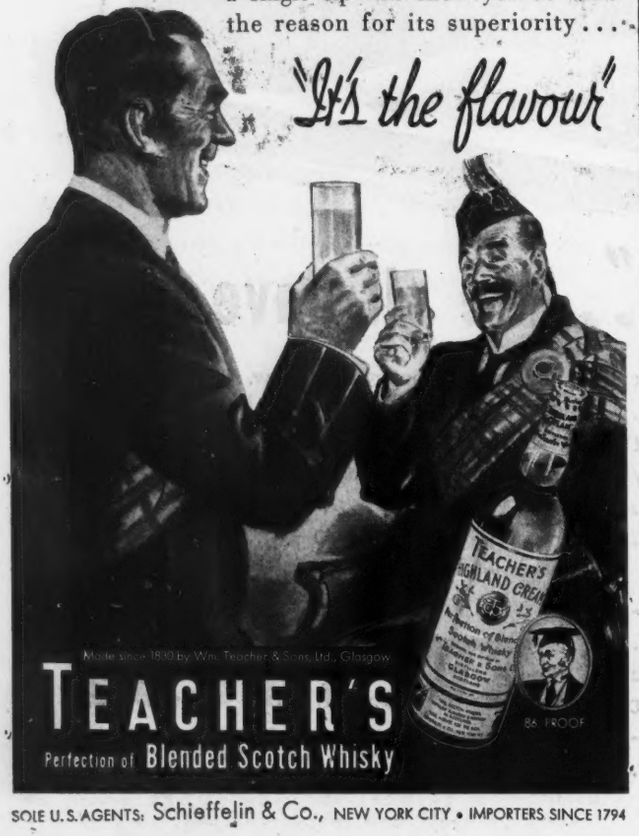
The fine motors that now go, and which for more than two years have been flowing from the Evinrude plant to all branches of our fighting forces, are designed to speed the day of Victory . . . when *pin-ups* can become *realities.*

EVINRUDE MOTORS, *Milwaukee, Wisconsin*
Evinrude Motors of Canada, Peterboro, Canada

EVINRUDE
OUTBOARD MOTORS

Wor-r-rds can nae describe...

Words alone cannot describe the true excellence of Teacher's Scotch. But a single sip will show you at once the reason for its superiority . . .



Made since 1830 by Wm. Teacher & Sons Ltd., Glasgow

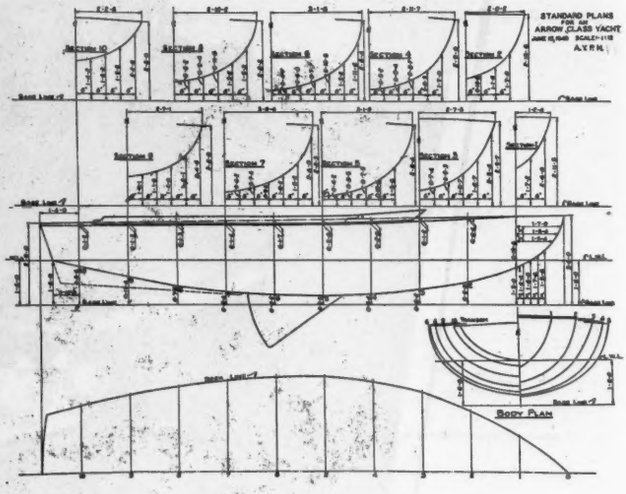
TEACHER'S

Perfection of Blended Scotch Whisky

SOLE U.S. AGENTS: Schieffelin & Co., NEW YORK CITY • IMPORTERS SINCE 1794

18′ 0″; beam, 6′ 4″; draft, centerboard up, 11″ and with the board down, 33″. The centerboard is of $\frac{3}{16}$″ galvanized steel. The height of the mast is 25′ 6″ and the length of the boom is 12′ 0″. The sail area is 180 square feet. The outside planking is of $\frac{5}{8}$″ mahogany and the deck is of $\frac{1}{2}$″ spruce, canvas covered. There are 200 pounds of inside ballast and a hatch for an outboard motor is provided as shown on the plans. Harry Nye, of Murphy & Nye, Chicago, designed and made the sails used in the racing fleet. New suits of sails, however, are not available at present because of war restrictions.

The complete organization of the fleet, to handle plans and other fleet matters, is being perfected by George A. Quinlan, of Chicago.



PLASTICS AND TOMORROW'S BOAT

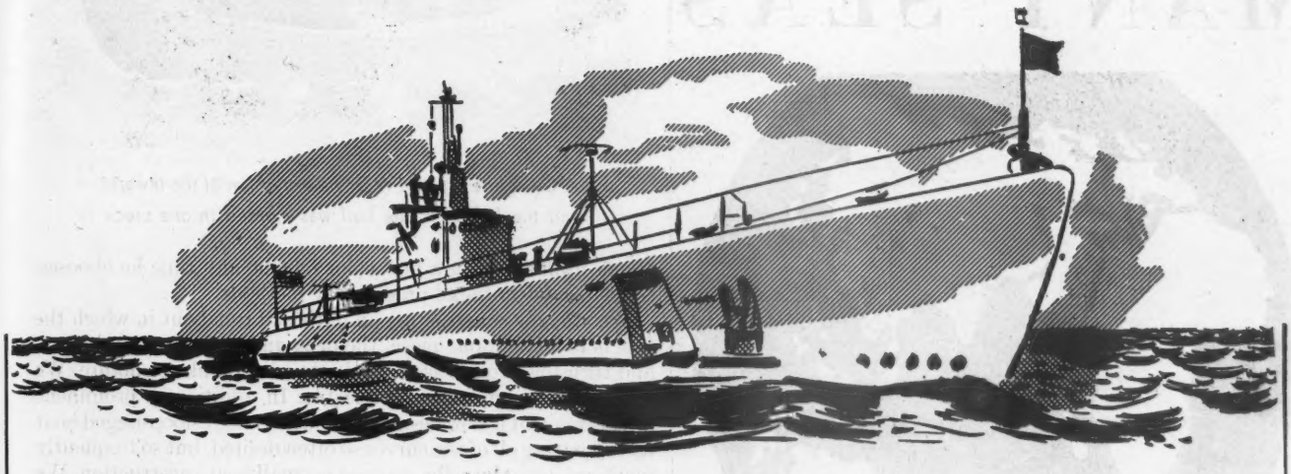
(Continued from page 71)

helm. So we drew up the lines for an eight-foot dinghy and proceeded to build a 2″ = 1′ scale model. This model created a great deal of interest, probably more than any other sample we have built. The fact that some of our organization were boatmen was another incentive, so the whole thing was a logical sequence. From this point on, we went to work in earnest.

Last summer a catamaran was designed, using two rejected tank shells as pontoons. Because of the pressure of war work, it was necessary to send our prints to a local pattern maker. He did a splendid job and, about the first of August, the *Co-Ro-Cat* was launched in Owasco Lake, with due ceremony. She was rigged with a Penguin mast and sail and was in service the balance of the summer. While not designed around nautical lines, we were interested in watching the material in action, noting how it stood up under rough handling. These pontoons were about $\frac{1}{8}$″ to $\frac{3}{16}$″ thick, 9′ long and weighed 20 pounds each. Each pontoon was made air tight and was capable of supporting 500 pounds.

When the *Co-Ro-Cat* was hauled out at the close of the season, there were no visible signs of deterioration, abrasion, or water absorption. This winter she is being stored outdoors, "pontoons up," near the Laboratory, where careful observation will be made of the effects of rain, snow, ice and sunshine.

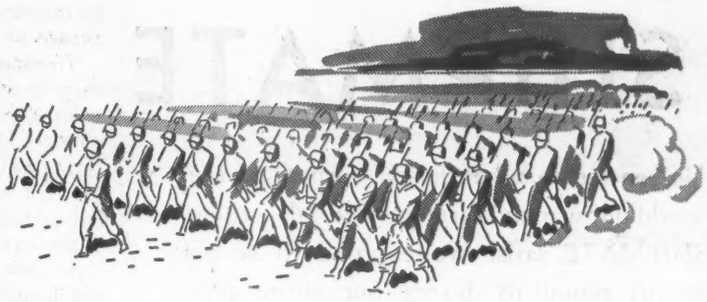
In the meantime, additional shells have been anchored off the Connecticut shore under the careful observation of a yachtsman. Model hulls are floating in test tanks of water under varying conditions and these hulls are examined periodically. Accelerated tests in "weatherometers" have been under way for some time. We hope, therefore, by the end of the war, to predict fairly well what the owner of a boat made of this material may expect. We shall probably recommend for the present, at least, that hulls be painted or varnished with a good resin varnish. We think some boat owners will always demand color on their hulls and it is not beyond the realm of possibility that this color may be molded in, and be quite permanent. This, however, would not prevent an



PETROLEUM'S PLACE IN THE WAR EFFORT: EVERY PLACE!

UNDER THE COVER of darkness the submarine comes to the surface, and with the power of its Diesel-powered engines recharges its batteries so that it might travel beneath the surface, come the morrow. Diesel fuels are also used to supply the motive power of PC boats and similar small craft.

NO LONGER do soldiers Drill on fields covered with dense clouds of dust. For dust-laying oils, developed for peacetime use on playgrounds are being used on parade grounds to provide a cleaner, healthier place for training.



BECAUSE OF modern refrigerating methods foods can be kept at neighborhood food store freshness no matter how far our armed forces may be from home. Refrigerator machine oils with low pour points are used extensively for the compressors for virtually all refrigerating and ice making equipment—from the small home unit to the giant industrial and Army installations.

★ *The American petroleum industry has undertaken—and is performing—huge tasks of immense importance to our war effort. Gulf takes deep pride in its privilege of serving in these accomplishments.*

GULF OIL CORPORATION
GULF REFINING COMPANY

GULF

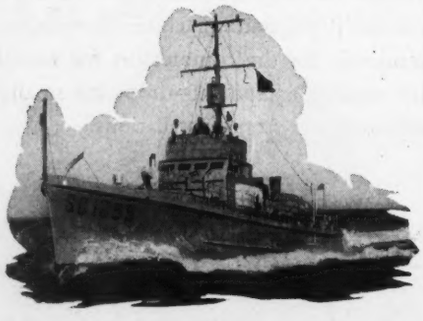
How many U. S. War Bonds will you wish you'd bought 10 years from now?

MANY SEAS

.... but only

1 SHIPMATE

No matter to what far-off corners of the world our war and cargo vessels sail — there SHIPMATE sails. We're proud to be on board; proud to devote our entire production to the war, so that in the world of the future SHIPMATE and pleasure craft may sail the seas in peace.

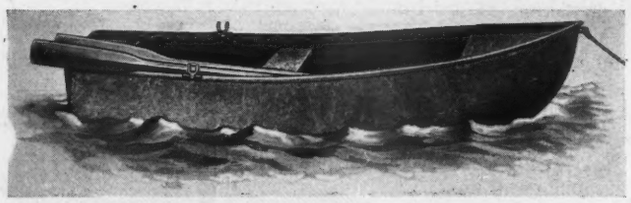


SC 1355 built by Luders Marine Construction Co., and equipped with Shipmate range.

SHIPMATE MODEL 1200: Three-foot oil-fired range; double-wall construction; heavy insulation; low initial, operating and maintenance cost.

The STAMFORD FOUNDRY Co.

ESTABLISHED 1830 ■ 10 CANAL ST. ■ STAMFORD, CONN.



A Co-ro-lite dinghy. With the exception of the thwarts and the foredeck, the hull was molded in one piece

owner from applying a new color scheme any time he chooses, by using conventional present-day methods.

We are now constructing an outboard runabout in which the hull is molded in one piece, the deck and seats a second piece, and then the two are assembled into one box-like structure. We think this design quite practicable. In addition, a prominent naval architect is now designing for us a 17-foot sloop-rigged boat incorporating all of the curves so often desired, but so frequently sacrificed to reduce the expense in small boat construction. We hope to have one or two of these launched by next summer.

Frequently, we are asked about repairs to damaged hulls. We believe that a hull with a hole punctured in it, through accident, can be temporarily repaired by covering the hole with waterproof cloth cemented in place. A permanent repair can be effected by rounding out the hole with a collar saw or knife and fitting a disc of the same material in place, holding it there with some of the newer plastic cements, such as Cycle-Weld or Reanite. While this plastic is harder than most woods, it can readily be machined and worked with wood-working tools, although it cannot be nailed. Drilling and tapping are quite practicable.

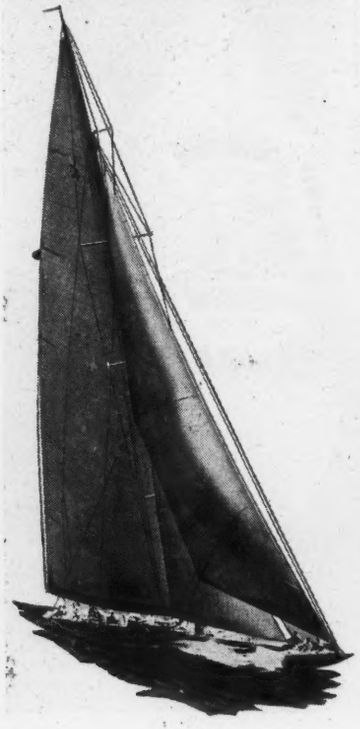
To summarize the advantages of a Co-ro-lite boat, we think they lie first in low initial mold cost, low production cost when volume can be had, and lightness of weight coupled with high strength. Metal fittings and extra ribs can be molded in place, becoming homogeneous with the hull. We hope also to be able to say that an unusually low maintenance cost may be expected, but we feel that this should be backed up with more experience in the water than we have yet had.

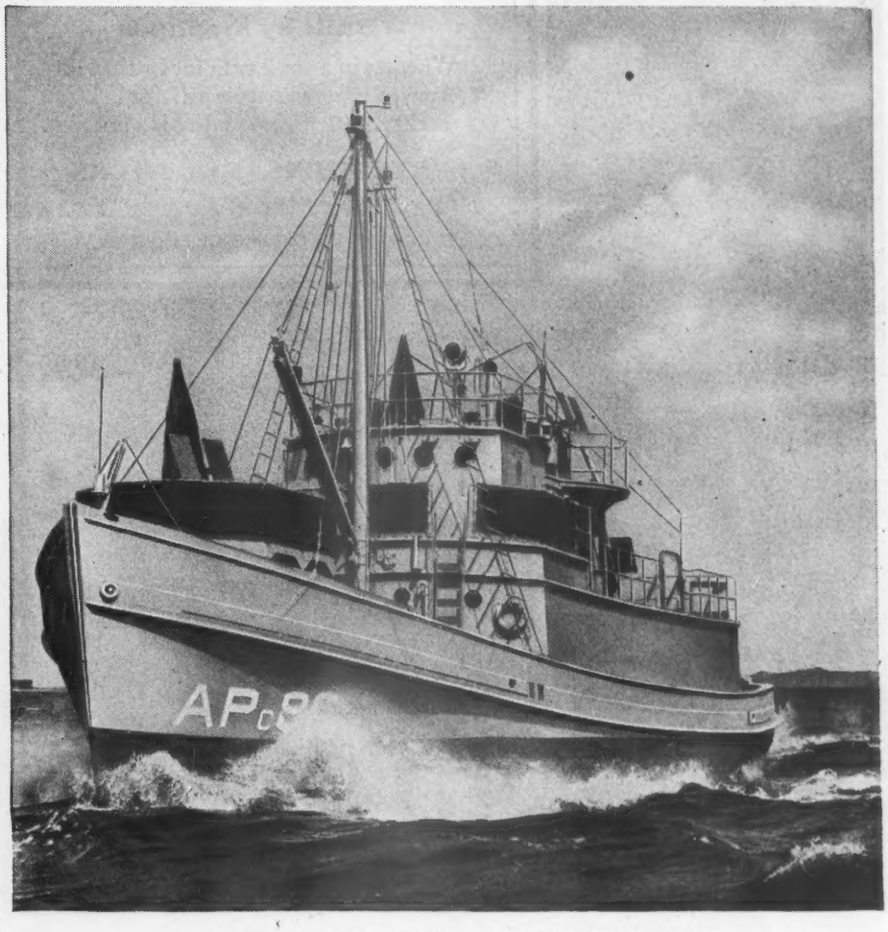
As a result of the foregoing discussion of what the ideal material should hold for the boat user and builder, and the experience which we of the Columbian Rope Company have had in the application of plastics to boats, the reader will probably ask: "What will this mean to the cost of boats generally?" or, "What can you tell us about the size of the moldings that you can make?" Both of these questions are difficult to answer at the present time. As to the first, this will depend largely, of course, on the volume that develops. Much will depend on the costs of the raw materials in the post-war period. Also, much will depend on the type and character of the design and, therefore, the costs of making the mold.

As to the size of the hull which can be made of plastics, and we realize that this is a subject of major interest to yachtsmen, this much can be said. In the first place, we have started with small models and have progressively worked up to the *Co-Ro-Cat*. Although not designed for the medium in which she was used, she did prove that she could "take it" in very heavy weather and was about as fast in light winds as a boat with the same sail area. Of greater interest, perhaps, was the fact that at the end of the summer, when hauled out, she had not taken in a drop of water. As has been mentioned earlier, a 17′ Marconi rigged sloop is on the boards, which should give us a good line on her performance against nationally known classes before another summer is gone. While, as yet, no work has been done on either sail, auxiliary or cruiser hulls between 30′ and 45′ over all, we think that before long it will be possible to consider these fields. And, what is most important, we do know that 35′ plastic hulls are being molded today.

As in any line of new endeavor, the engineering problems which must be worked out are always perplexing and, although the progress at times may seem slow, it is often best to proceed with caution so that it is known with certainty that the final product is good. We, of Columbian, have a great deal of enthusiasm for this new material. We feel that "'ere many moons" a new chapter will be written in the old story of boat building.

For 80 years, the name "Herreshoff" has been closely linked with yachting. The Cup Defenders *Vigilant, Defender, Weetamoe, Resolute, and Enterprise* were Herreshoff-built, and their hull plates were Tobin Bronze*, an exclusive Anaconda Alloy. The 1934 winner, *Rainbow*, shown here, was Tobin Bronze plated below the water line.





A 103-foot, APc Coastal Transport built by Herreshoff

IN PEACE OR WAR

Herreshoff builds with Rustproof Anaconda Metals

Herreshoff—widely known builder of America's Cup Defenders and currently building Mine-Sweepers, Motor Torpedo Boats (PT's), and Coastal Transports for the Navy—has been a consistent user of Anaconda Metals.

In APc Coastal Transports launched in large numbers from the Herreshoff yards, thousands of non-rusting Everdur* Screws were used for hull fastenings. Anaconda Copper and Copper Alloys were employed extensively for brackets, struts and other marine hardware . . . for structural plate and pipe and tubing.

Owners of pleasure craft of the future will benefit from new production methods developed by our leading builders in supplying the large volume of construction needed by our armed forces.

*Tobin Bronze and Everdur Reg. U.S. Pat. Off. 43126

ANACONDA *Anaconda Copper & Brass*

THE AMERICAN BRASS COMPANY—General Offices: Waterbury 88, Connecticut

Subsidiary of Anaconda Copper Mining Co. • In Canada: ANACONDA AMERICAN BRASS LTD., New Toronto, Ont.

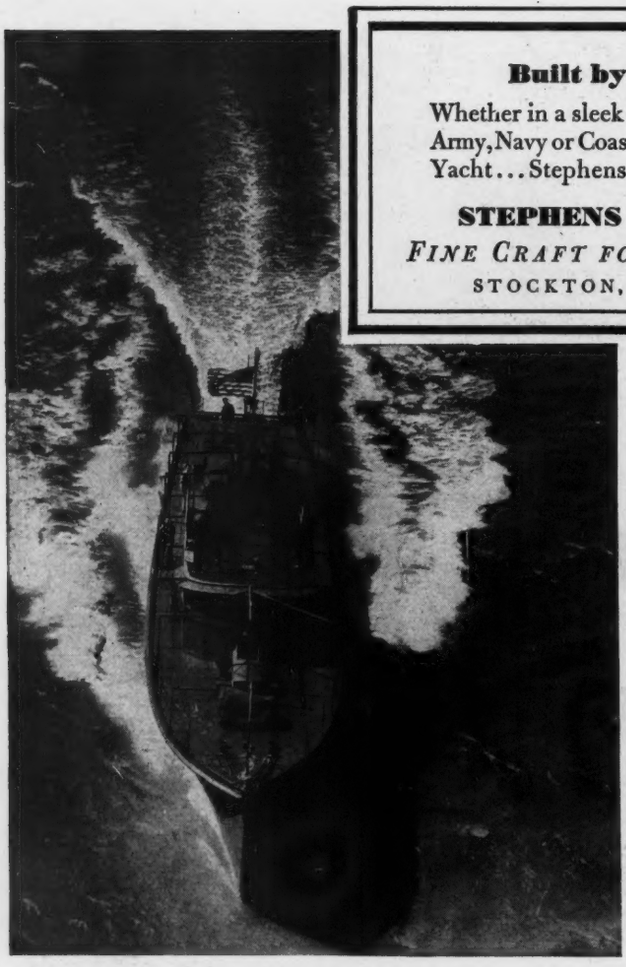
Built by Stephens

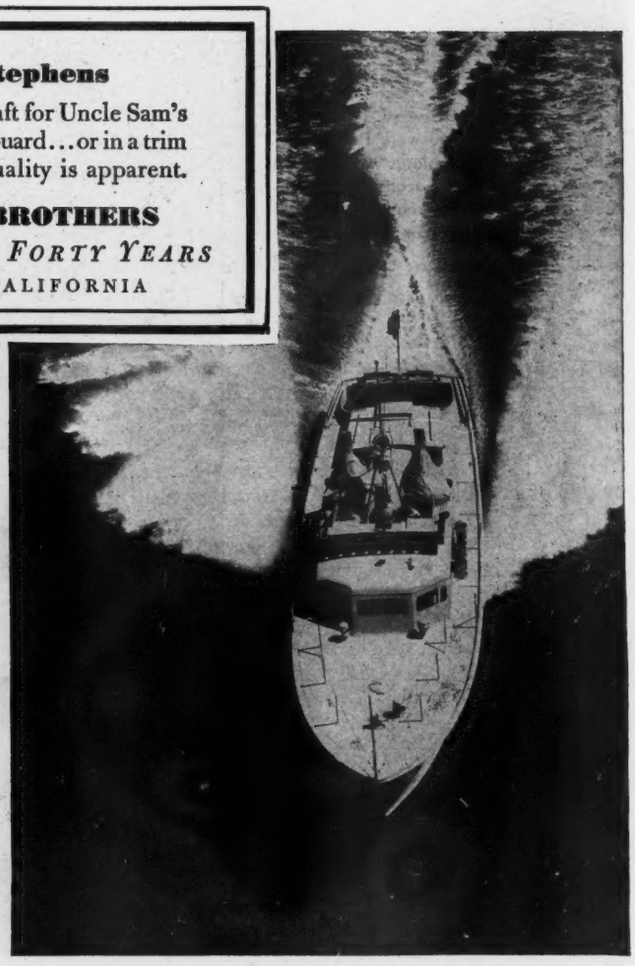
Whether in a sleek craft for Uncle Sam's Army, Navy or Coast Guard... or in a trim Yacht... Stephens quality is apparent.

STEPHENS BROTHERS

FINE CRAFT FOR FORTY YEARS

STOCKTON, CALIFORNIA





SMALL BOATS IN WORLD WAR II

(Continued from page 76)

The crews of these vessels are part of the unsung heroes of this war. Day in and day out, they carry on their monotonous and often dirty jobs. Most of their boats are lost by accident rather than through enemy action, and when one is sunk by bombing or shellfire, nobody hears about it. Yet these dogged and untiring craft often distinguish themselves in action with the enemy that would do credit to any of our large warships. Take the case of the *Challenger*, for example. The odds are that you never heard of her before, but when you learn of how she became a "one man Navy," you won't forget her name in a hurry.

Built in San Diego, in 1940, for the tuna trade, the *Challenger* was a Diesel electric motorship 128′ long with a beam of 27′. She was a good stout ship with decks of mahogany, but even in a dead calm she rolled to her beam ends. Owned by Oakley Hall, of San Diego, she was fishing off Panama when the United States called the fishing fleet into service. Her first assignment was to challenge submarines and suspicious craft around the Panama Canal area. Her crew consisted of twenty-five men and the skipper was Warrant Officer Walter H. Calhoun, of Exeter, California, with 34 years service behind him. Captain Calhoun had not always been in small boats; he had served on the aircraft carrier *Saratoga* and the battleship *Utah* in his earlier days, but you couldn't get him out of small craft now for all the tea in China.

She was the first YP to be sent to the Solomons combat area. There she towed crippled ships, rescued personnel and hauled supplies, in addition to her many other duties. She soon became known as the "Queen of the Yippies," "Guadalcanal Ferry" and "Solomons Island Navy." On more than 100 trips between Tulagi and Guadalcanal, the *Challenger* carried aviation gasoline, bombs, ammunition, marine raiders, Jap prisoners, aviation parts and other vital materials. On fifty-five of these hundred trips, enemy planes were overhead, but she calmly went her way while her crew threw everything but the anchor at the Japs. Ashore on Guadalcanal, the Marines used to lay bets among themselves as to whether or not she'd make it.

One day she was ordered to shell Lunga Point and destroy some Japanese tanks and tank lighters there. She hit every one of the tanks and ended up with a total score for the day of seventeen tanks and lighters plus hits on ammunition and oil dumps.

The "Guadalcanal Ferry's" record would be amazing enough if that were all she had done. But it by no means ends there. She landed the first expeditionary force for the airfield at Espiritu Santo in the New Hebrides. During her tour in the Solomons she helped save three PTs, a cargo ship, another YP, the destroyer *Aaron Ward* and several other ships whose names cannot be revealed. Although she was never listed as a combat ship, she was attached to a task force and, during the five months she was in the Solomons, she had a hand in all the naval engagements that took place in that area during that time. Battles listed on the combat record of the *Challenger* are: the Battle of Cape Esperance, October 11–12, 1942, the Battle of Guadalcanal, November 12–15, 1942, and the Battle of Lunga Point, December 1, 1942. She is still in active service somewhere today.

One of the Navy's biggest small craft problems has to do with their maintenance and repair needs. Practically all of them are wooden-hulled and thus require more attention to their bottoms than is the case with steel-hulled ships. The Navy has made every attempt to have their bottoms cleaned as often as possible, particularly in the case of boats attached to the Panama Canal area where the shipworm problem is worse than elsewhere. Floating drydocks have been sent to outlying bases whenever possible but, due to the exigencies of war, some boats can not receive as much attention as they normally would. Where it is not possible to take the boats out of the water, they are usually sent to fresh water areas for a period of from two to three weeks in order to remove the worms.

The task of finding spare parts for engines becomes enormous in view of the fact that in one group of 450 YPs, there are 350 different types of engines. Some power plants in service actually have no duplicate in the Navy. Add to this the fact that some of

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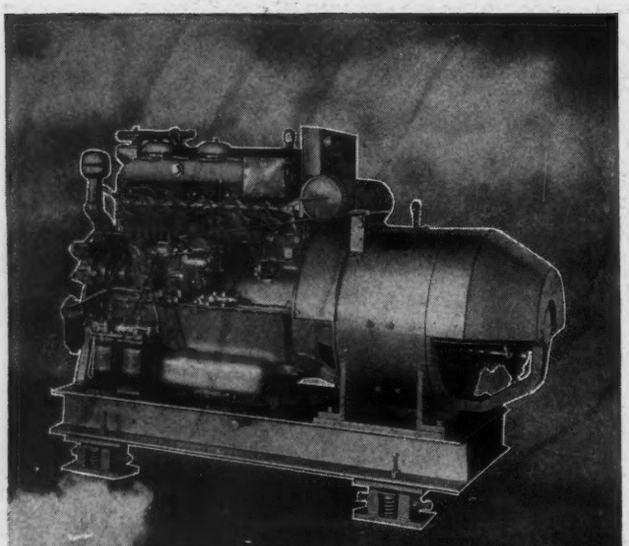

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them are of foreign make and you will understand why some of the officers attached to the Navy's Bureau of Ships are rapidly becoming grey-headed. Most of the engine manufacturers in the United States have long since switched their production to vital war work, and to produce spare parts today would necessitate a temporary stoppage in their present output of war materials. Of course, it is impossible to obtain parts for engines which were manufactured in Germany. Fortunately, some small boats are near enough to tenders so that some of the needed parts can be made in the workshops of these larger ships.

Because of the need to conserve manpower, the remoteness of the possibility of attack on the continental United States and the availability of Navy-built auxiliaries, a number of small boats that were pressed into service at the start of the war are now being decommissioned. A recent directive of the Vice Chief of Naval Operations to the Commandants of the various naval districts ordered 40 per cent of the vessels of less than 100′ overall length under the cognizance of the districts to be laid up. The larger part of the vessels to be surveyed will come from the Coast Guard Reserve boats now operating under the Commandants. Public Law No. 44, passed by Congress since the start of the war, further stipulates that fishing vessels be returned to their original owners wherever possible. Regardless of these official actions; you may be sure that when the end of the war rolls around a lot of the boats that were requisition-purchased, or bought for a dollar, back at the start, will still be in active service.

The opinions and assertions contained in the above article are the private ones of the writer and are not to be construed as official or reflecting the views of the Navy Department or the Naval service at large.

ICE BOAT RACING—A FEW DO'S AND DON'T'S

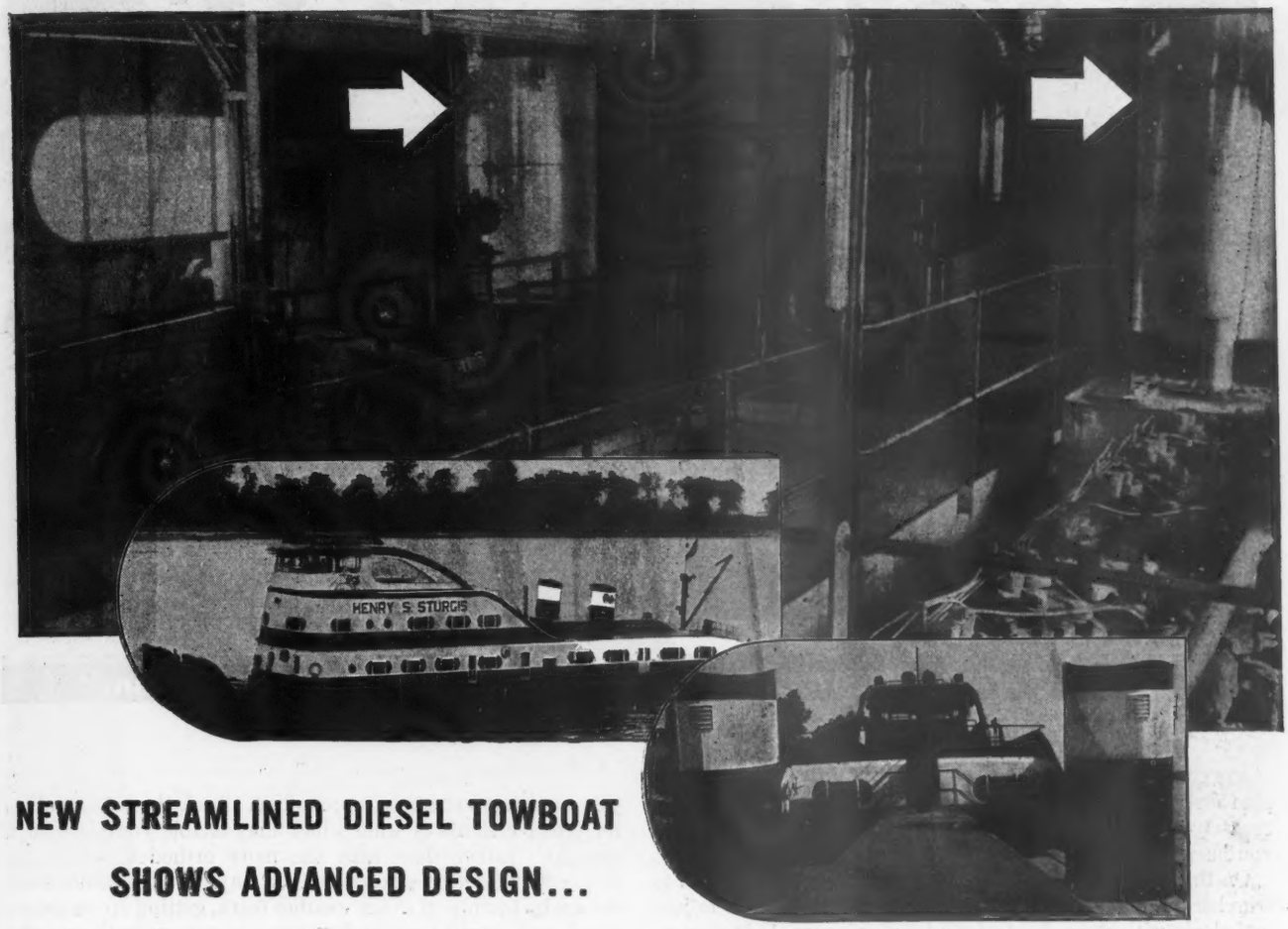
(Continued from page 73)

having a tendency to slice its way into the soft stuff instead of lifting the boat up and over. A fourth runner type, the angle iron shoe, is often used because it is light in weight (a doubtful advantage) and inexpensive. It makes a wide faced 90° runner, capable of supporting a boat in slush that would otherwise be unsailable, but I have never seen it used under conditions when a committee would start a race. The 85° cast iron runner will give the boat almost as good support, is far stronger, and will fill the bill in all respects. Furthermore, the angle iron shoes are extremely hard to sharpen without constantly flattening the cutting angle.

A word in passing about sharpness of cutting edges: never use a razor-sharp blade except on the glassiest ice in a strong wind, where everything else will skid. As the wind lightens, use duller runners — the dullest you *can* use without skidding, under any conditions. A dull runner is naturally faster than a sharp one; only if it skids from too much wind pressure should it be replaced by a sharper one. This does not imply that your runners should be kept dull. Quite the contrary, keep them sharp, and dull them a trifle if the wind is extremely light by running a fine emery cloth lightly over the edge, just enough to take off the "bite." Always file runners with a long, smooth stroke of the file, and keep the file clear of cuttings and chips that would mar the runner on the next stroke. Finish after filing with fine emery cloth soaked in light machine oil. A good fast set of runners should shine "like a nigger's heel." Moreover, once they are in good shape, it is easy to keep them that way. Always remove them and dry them thoroughly after a day's use. Follow the drying with a light machine oil rub. Don't daub heavy oil or grease all over them except when laying away for the summer. A film of light oil is just as good.

So much for the sailing conditions (wind and ice) and their effect on our equipment for the day. The next thing to do is to get under sail as quickly as possible and get out on the course so you can "feel out" the wind, both as to strength and direction, all the way around the course. (In preparing to race on a strange course, it is good dope to secure a U. S. Geological Survey map of the region involved and make several tracings of prominent hills, ridges, valleys, etc., in the neighborhood. You can then sketch in the probable lines of wind flow over this

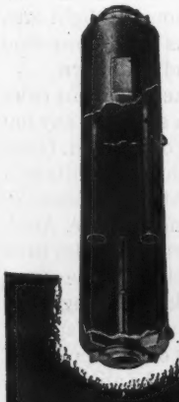
MAXIM SILENCERS on "Henry S. Sturgis"



NEW STREAMLINED DIESEL TOWBOAT SHOWS ADVANCED DESIGN...

This new twin screw Diesel towboat, designed and constructed by the St. Louis Shipbuilding and Steel Company, was put into operation by the Ohio River Company in mid September. It carries Maxim Silencers on the air intakes of the main engines, two 7 cylinder Fairbanks-Morse Diesels. Maxim exhaust silencers insure quiet operation of the auxiliary engines which are used to run the generator sets.

This new towboat is typical of hundreds of other craft of all kinds in its use of Maxim Silencers to insure quiet, safe operation of its engines. Maxims will be found all over the world today on practically every type of naval or merchant marine craft afloat, from submarines to aircraft carriers. The dependability of Maxim equipment and the reputation of Maxim engineering has had much to do with the universal use of Maxim Silencers in today's critical marine installations.



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area for various wind directions. You will be amazed how accurately you can work out probable wind shifts on a course you have never seen.)

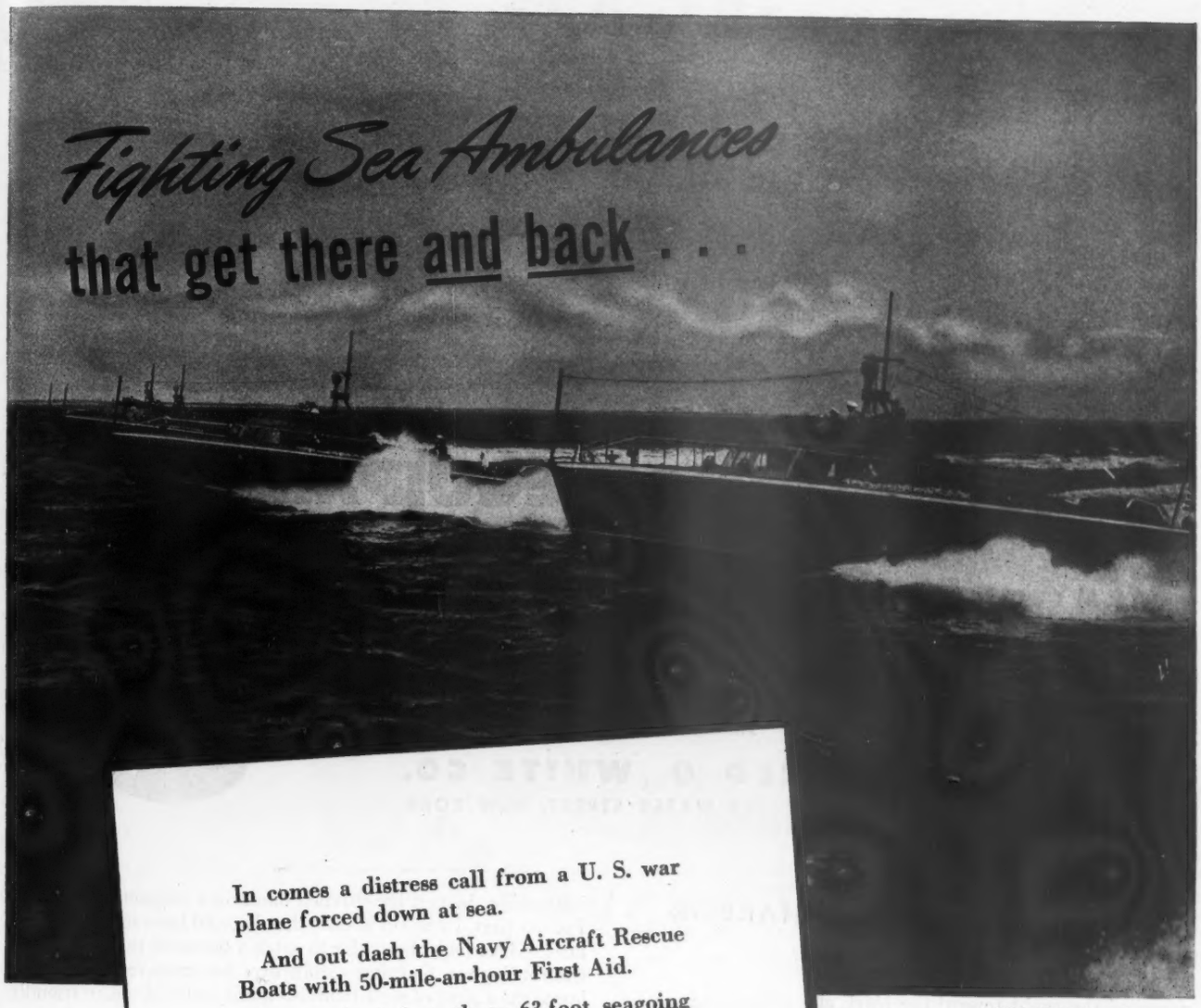
On this little jaunt, no matter how strong the temptation to trim her down and get a thrill, you should force yourself to just loaf along, with eased sheets, for a lot of reasons: (1) It does no good to show your competitors what they may expect from you in the way of speed; (2) Moving slowly, you stay in one spot longer and get a better picture of what the wind is doing than if you whiz by in a second or two and meet only one puff, or a part of one, at each part of the course; (3) Loafing, you aren't skidding all over the lot, dulling your runners to no good purpose; (4) Loafing, you shake your sail and rigging down and get everything set without danger of parting rigging or splitting a sail. (On this point, it is wise to sail hard for a short way, to show up any unexpected weakness that might be fatal during a race, and to test your runners to see if they are sharp enough. If they show a tendency to skid a little in the very hardest puffs, they are OK. This much skidding is a safety factor rather than a disadvantage for a bow-steering yacht. Stern-steerers, however, fall off rather than come up when they skid, and therefore should be more wary and avoid it at all costs. Constant skidding in the "average" wind for the day is no good, and sharper runners must be substituted. Often a course is laid out so that all the turns and most of the windward work will put the strain on one runner. It is not bad tactics to stick a sharper runner on that side only. This is particularly effective if most of the downwind work can be done with the pressure on this duller, faster blade.)

In this exploratory loafing expedition, note carefully all sizable points and coves, both on weather and lee shores. The wind fans out of and draws into coves just as water fans out of and draws into a funnel. You can count on a change, both in velocity and direction of the wind, off every point and every cove. Check the windward leg for possibilities of extra high pointing by taking advantage of such shifts at certain spots. Test the weather mark to see how sharp a turn will be required, and which jibe you want to carry after rounding. Check the downwind leg for possible slants of wind which may enable you to "run it straight" rather than take the more orthodox but longer zigzag course. Often a downwind leg may be sailed as one long, flat arc by tearing off at the weather mark, getting up maximum speed, and slowly turning downwind as you go until you jibe about halfway down the leg, pick up a slight shift of wind and carry it right to the lower mark without loss of speed.

Finally, test the lee mark, noting particularly how you want to approach it to avoid excessive skidding as you round up on the wind. (See Course Sketch No. 1.) If the first tack of the windward leg is best taken on the starboard tack, then approach the lee mark on the starboard jibe, good and wide. This will enable you to cut it close, run high on the wind at once, and thereby place all your competitors definitely in your wake. They will be forced to come about, whether they like it or not, if they want to keep their wind clear. Avoid jibing *at* the mark; make your final jibe 50 to 100 yards before you get there. These figures assume good ice and a good breeze, which should find your speed ranging from 30 to 60 miles an hour. In light airs, the tactic is to discard high pointing or runs dead downwind in favor of "full and by" sailing both upwind and down.

These "fact-finding" maneuvers should take you about twice around the course, during which time you can also note any unusual ice conditions, either to be sought after or avoided. Lanes of clear ice will sometimes show up among light snowdrifts as if put there by Providence. By all means, locate these ahead of time and use them for all they are worth during the race. Areas of hard water ice on an otherwise snow-ice surface are also to be sought after if they are of any appreciable size. On the minus side of the ledger, bad cracks, soft spots, over large fishing or eel holes, rocks, sticks, etc., frozen into the ice, should be spotted carefully. Nevertheless, by avoiding all bumps or wet spots that show up in the snow blanket, you will probably be able to keep away from the worst of them. As for the ones you can't avoid, good luck to you! That's about all you can do.

(To be continued)



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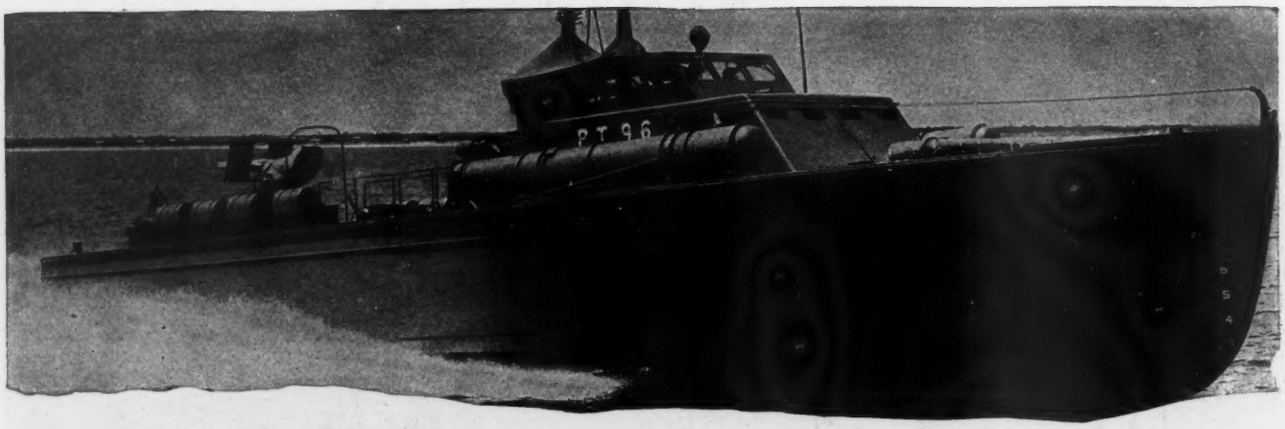

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A QUIET NIGHT IN HARBOR

(Continued from page 78)

propelled the yacht toward the black cliff of buildings ahead.

"Throw me yer rope." The suddenness of the voice so close at hand did nothing to help sooth my tired nerves. I glared blindly into the darkness. Nothing. The command was repeated, the slightest sign of impatience creeping into its Yorkshire accent. I began to wonder if I had not wandered into some queer, forgotten world, a world of perpetual night inhabited by a race of men capable of seeing in the dark. "Here," he directed, and I looked forward to see a pair of trousered legs faintly lit in the glow of my port light. Running along the deck I passed him first a bow line and then one from the stern. Having thus made fast alongside the wall-sided barge, I asked him, impractically enough, whether I had chosen a sensible place to lie. In his gruff manner, he assured me that the mud was so soft right beneath the ship that when the tide fell she would sit serenely upright. The only thing I must be sure to do, however, was to hold the yacht clear of the shallower barge just before grounding, otherwise the barge might slip down the sloping mud and injure *Uldra*. I asked him how long it would be before that was necessary. He said an hour. So I mentioned the fact that I pined for a glass of beer. He merely said: "Follow me."

During the blow the previous night, my flashlight had been swamped and I did not think to light a lantern to help me follow that simple instruction. But my samaritan was considerate — after all, he wanted his glass of beer more than the job of hauling me out from between two barges — and he led me step by step over the wet, slippery decks of the grunting hulks. At length we reached the comparative safety of a cobbled wharf and, except for the risk of a twisted ankle, the main danger was over.

Not until we had stepped into the glare of the bar had I been able to glimpse my new acquaintance's features. When I finally saw them they prevented me from thinking for the moment. Of course, he may have had the same reaction. For instead of a salty sailor, he met the stunned blinks of a bespectacled youth. For my part, I was not so sure that I would have mentioned my need of beer had I been able to catch a glance of the ruffian now confronting me. Curving a smile over his unshaven face, he allowed me a sight of semi-toothless gums and told me, in friendly enough fashion, that his name was Tom. While he looked at me with his left eye, his right maintained a steady gaze at the Christmas decorations our landlord had rather prematurely strung across his ceiling. On his head Tom wore one of those felt hats in the condition a sailor truly loves, bandless and battered, stained and well saturated in the grease of the brow. Like me, he was wearing a blue woolen jersey and a pair of pants that had long been separated from their companion jacket. But he wore one item that I did not possess. He had it tucked in his belt. A long, scimitar-like knife that he persisted in fingering. While our pints were being pushed across the bar I cast another glance at Tom and it was then that I realized where I had met him before. Replace the crumpled hat with a blood red kerchief, and he was the artist's model for all the Captain Kidd stories ever illustrated. My discovery was not altogether stimulating.

Conversation, however, proved that Tom was not the bloodthirsty villain my imagination had made him. His robbing was directed against the sea, for its shrimps, and the Government, for its dole. He lived, not in the fo'c'sle of a piratical craft but within the cramped dimensions of a tiny houseboat moored in the weird Wellsian country from which we had escaped.

Tom was a store of inconsequential facts. In no relation to the topics about which we were chatting, he would digress widely to inform me of the number of religions in India. Receiving my utter astonishment with a nod, he would switch back to more personal matters, only to step lightly aside a few minutes later upon a tangent that had something to do with Napoleon. If life had divested Tom of the luxuries, it had done nothing to impair his volubility.

When the prescribed hour was up, we returned to *Uldra*. We held her away from the rough, tarry side of the adjacent "keel" until we felt her touch bottom. Cheerily, Tom bade me good-

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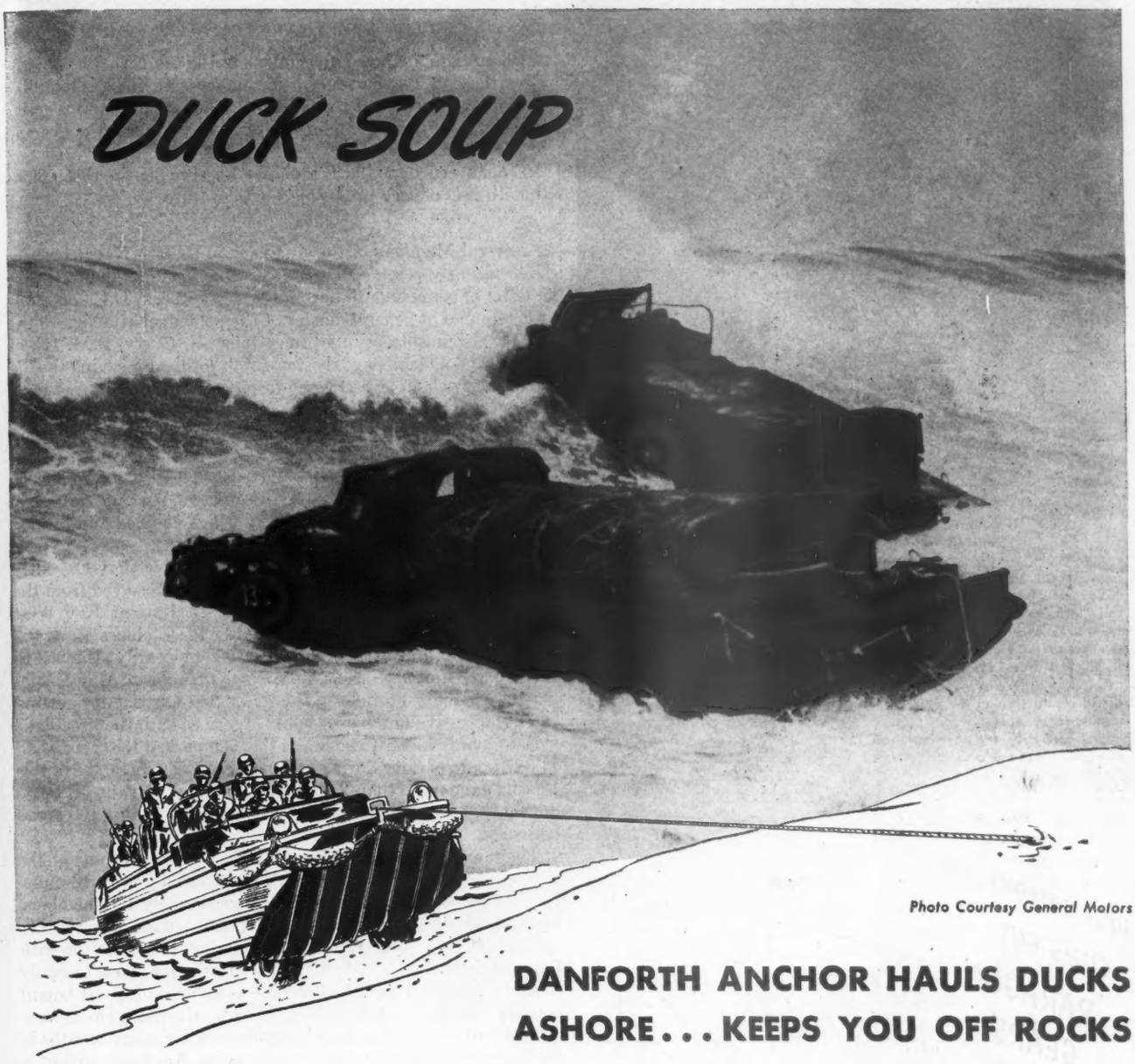
night and disappeared, but not before assuring me once again how comfortably upright *Uldra* would sit in the mud. I went below to fix a snack to eat. The yacht heeled slightly but I realized that she was likely to do this at first, at least until she had dug herself a groove to settle in. She heeled more. I still smiled to myself reassuringly. If she went over no further than this, it would not be too uncomfortable. Ten minutes more and the angle of her heel had increased noticeably. Too noticeably; I had slipped and sat in a plate of bread and jam. She did not stop this gradual leaning until her topside cushioned the ooze. I am not exaggerating, I slept on the book shelf that night! And I did not sleep too soundly.

The more I looked at the acute angle of the ship, the more I worried about her chance of lifting on the flood. Wild schemes of boarding up the cockpit flew into my head, and out again when I realized I had not the necessary wood and nails aboard. The one precaution I took was to rig a heavy block and tackle from the hounds to the solidity of the nearby "keel." That was at four o'clock in the morning. Dawn was far away. I sat on the barge's hatch and waited. An hour drew by, and I could hear the whispering trickles of the approaching tide as it crept up the sloping ooze.

There was no dawn, the light just happened. The insipid pink of the city's night sky gave way to a dull, flat, uninspired ceiling of gray. Dim shapes formed in the hitherto blankness of my surroundings. Numberless "keels" edged the crater of the dock; the façades of the warehouses acquired dusty, unkempt windows; an old coasting ketch, her slender topmast hooked extravagantly forward, appeared out of the gloom right across from me. But what occupied most of my attention was the purposeful oncoming of the tide. It was not my friend, as so often the returning flood can be to a vessel aground; it was my enemy. And a slinking, sinister enemy at that. It was not coming into the fray with a hurrah and a rush; it was trying to be cunning. Bearing its camouflage of filthy scum, it would advance on a broad front, and then stop. A flanking movement to the right would make a sudden charge and, a moment later, the same tactics would be taken up on the left. Then the whole concerted mass would make a rush and a large area of sizzling mud would fall victim to the rapacious attacker. Victoriously it reached *Uldra's* gunwale, swarmed over the top at a chosen point and, as if the surprise attack had been carefully planned, splayed out its front line troops of brownish froth and overwhelmed the deck. It seemed so jubilant over the success of this thrust that in short time it rose to within an inch or so of the top of the cockpit coaming. I sweated feverishly on the tackle; *Uldra* remained lifeless. She was like a drunken body lying in a ditch, oblivious to how she looked, completely careless of the future. Leaving the tackle for a moment, I went aft to see how far the enemy had reached. It was actually lipping the coaming. A few more minutes and the petty conquest of the gunwale would be forgotten as it leaped to its ultimate assault, the filling of the cockpit, the ship.

Not until the first reconnoitering party of watery dross had plopped into the cockpit did *Uldra* stir. Then she seemed to give herself a little shake of astonishment, and, as if realizing the absurdity and indignity of her posture, she vanquished the enemy with a blow. Asking no help from me with my tackle, she rolled herself to a more upright position, ridding her deck of the offending water, sending it into hasty retreat through her scuppers. Within the hour she was afloat once more; within another hour she was being towed out of that wretched dock.

I had pulled Tom out of his hideaway and had been thoroughly rude in my speech to him. The tirade had driven him into obtaining the tow and, reluctantly, he had consented to come along with me. Out in the river we dropped away from the "keels" and anchored. Tom pulled his dinghy alongside and, with no regretful note in his voice, said good-bye. There was a dangerous flash in his one free eye and he was noticeably restless. I felt a certain relief at seeing him leave my deck; the cheery, beer-sharing pal had gone. It would not have surprised me had a piece-of-eight fallen from his pocket. He glowered at the world and especially at the half crown he had not earned. I did not remark even on the interesting fact that *Uldra* was anchored in precisely the same place as when she first arrived off Hull!



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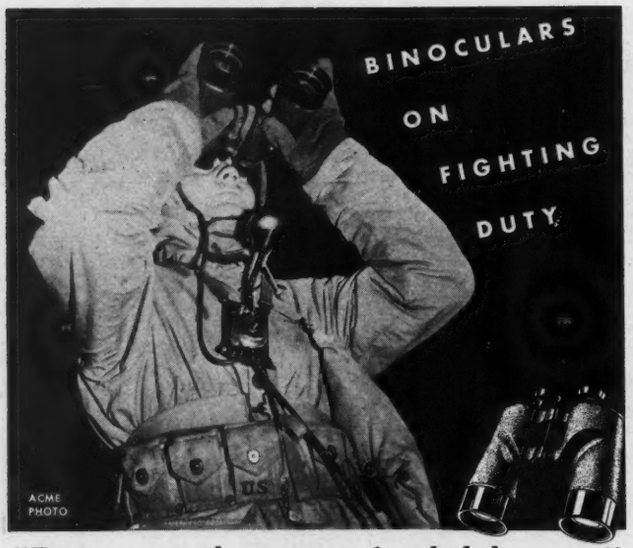

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WITH THE COAST GUARD AUXILIARY

(Continued from page 102)

as an outstanding accomplishment in the 5th ND. The Middle River Patrol, in operation since January 21st, 1943, is handling an important patrol at the Glenn L. Martin Plant, and is active in clearing seaplane landing right-of-ways, general police and rescue work.

From every angle the Temporary Reserve picture throughout the 5th ND is very promising for the future.

▶ Several Members of the Auxiliary in the 7th Naval District have recently received special citation for outstanding work. A letter of commendation from Capt. Whitbeck, D.C.G.O., was ordered read at general muster of the personnel attached to the COTP at Sarasota commending Henry R. Curry, B.M. 1C, of Bradenton, a member of the Sarasota Flotilla, for saving the life of a soldier whom he recovered from the Bay and brought back to consciousness by resuscitation. The Captain of the Port at Palm Beach sent out a letter commending Flotilla No. 1, Division 2, at Palm Beach, the Division Captain, Lt. (j.g.) G. Stambaugh, and the Flotilla Commander Ensign Risden for efficient work. This same Flotilla took a prominent part in the rescue of the crews from two large tankers which collided and burned off Palm Beach.

Several temporary Reservists in this District have recently served on convoy duty, and a letter has been received from the Commander of the Anti-Submarine Task Unit at Key West praising the service performed by Walter T. Hotchkiss, B.M. 1C, of Flotilla No. 1 at Miami while he was temporarily attached to a task force unit on convoy duty in the Caribbean. Many members of Auxiliary Flotillas in the 7th Naval District are putting in an impressive number of hours of service with the "regular" Coast Guard. In Ft. Lauderdale the Temporary Reservists had 11,127 hours of duty during October. Fourteen members of this Flotilla gave more than 250 hours each of service aboard boats during that month and one had 392 hours, or almost 100 hours per week.

There are now four Auxiliary Flotillas in Miami, one of the two original ones having recently been divided into three units. Each of these Flotillas consists of approximately 100 members, most of whom are enrolled in the Coast Guard Reserve (T) and are giving a good account of themselves in connection with the work from the Captain of the Port Base. One doesn't usually think of an inland, land-locked lake as an area of Coast Guard activity. However, at Mt. Dora, Florida, there is a small Auxiliary Flotilla which has done notable work for many months in the interest of Army aviation rescue work. An Army airfield is located near the lake and these few men have unselfishly patrolled Lake Dora every day in all kinds of weather.

▶ In the Twelfth Naval District two Flotillas are carrying out permanent patrols on Coast Guard boats, thereby releasing regular men for duties more vital to the prosecution of the war. The pride of the members of San Francisco Flotilla No. 11 is the gleaming new 50-foot picket boat on which they carry out a permanent 24-hour port security patrol on a section assigned to them. The patrol was commenced last summer on a 38-foot boat, which later was replaced with the new, better-equipped craft. A sister ship to the new craft was assigned to a patrol across the Bay, carried on since early in the summer by San Rafael Flotilla No. 14.

When the patrols were established last summer they were rather experimental, but so successfully and efficiently were they carried out that they were thereafter made permanent. Previously, the Auxiliary membership had consisted of experienced yachtsmen, all of whom were boat owners. New Auxiliary regulations then made it possible to take associate members (men who were willing to serve twelve hours per week on patrol duty) into the Flotillas and to put them through an extensive course of study which prepared them for the duty. Enormous gains were made when this went into effect, and the drive still is on to build the Auxiliary strength from what was less than 700 members to at least 2000.

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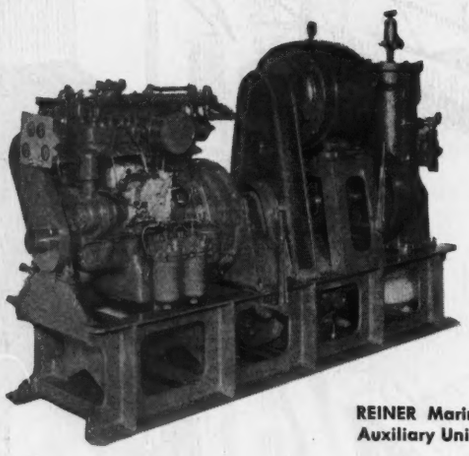

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★ ★ ★

THE U. S. POWER SQUADRONS IN WORLD WAR II

(Continued from page 83)

Guard Reserve and assigned to duty as the Training Officer for the Port. The Squadron at Hampton Roads (Virginia) had the interesting task of training men in small boat seamanship; this assignment came from the Port of Embarkation authorities. Grand Rapids has instructed more than 1000 Coast Guard trainees. A former Chairman of the Squadron Committee on Advanced Grades is on duty at a Naval Training Station as the officer in charge of instruction in navigation.

Coöperation with the National Committee of The Seamanship Training Corps manifests an interesting departure in training activities as the Committee has called upon Squadrons throughout the nation to assist in this important pre-induction work. Another development is the special course in navigation being given to commercial airline flight crew members.

Another major field of Power Squadron war activities might be designated as procurement. More especially during the first year or eighteen months of the war, the Armed Forces required large numbers of men having special skills, and needed them at once. In May 1942, the then Commanding Officer of the Army Engineer Amphibian Command called on the Squadrons for assistance in recruiting officers and men for this new and vital activity. Not only were the individual Squadrons able to locate and recommend qualified men from their areas, but they arranged mass meetings in many cities throughout the country.

During the summer of 1942, members of the USPS were appointed to the Personnel and Boat Procurement Boards of the United States Coast Guard. Their job was to assist in recruiting men and small craft for the anti-submarine patrol and for Coast Guard shore patrols. This work was a logical enlargement of the activities of the Squadrons in helping to organize Auxiliary Flotillas and to provide boats and crews for the Coast Guard Temporary Reserve. In addition, individual Squadrons have furnished boats and operating crews for transporting military forces across harbors and for the training activities of State Guard and police forces.

One Squadron assisted in the formation of a State Citizens' Enrollment Committee to obtain specially qualified officer-candidates for the U. S. Naval Reserve. Squadron members have served on this Committee continuously since its inception in May, 1941. More than 3000 men have been interviewed and hundreds of them have been commissioned. Their work is continuing. This same Squadron group assisted the State Navy Recruiting Officer in setting up a similar Committee for enlisted men which was so successful that the Recruiting Officer exceeded his quota month after month.

It has been our privilege to coöperate in many ways with the Armed Forces. We are proud of the fact that we were ready, willing and able when the calls came. We are humble in the face of the contribution that so many other members of the Power Squadrons have made. Robert Frederick Read, of the Rochester Squadron, was killed at his battle station on board an aircraft carrier in the Pacific. George B. Willcox, of Saginaw Bay Squadron, was lost when his plane was destroyed in the Alaskan area. Franklin Cook, of the South Jersey Power Squadron, is missing in action. Nine gold stars are on our Service Flag.

Members of the United States Power Squadrons are serving all over the world — over Germany, in Australia, Africa, Alaska, Italy, in the vast expanse of the Pacific Ocean — on land, above, beneath and on the sea, in the Navy, Army, Coast Guard, Merchant Marine.

The number of men in Service? Patapsco River Power Squadron at Baltimore has approximately 425 members on its rolls. Of this number, 105 men are on duty in the Armed Forces and 90-odd others are active in the Coast Guard Temporary Reserve. The Chattanooga Squadron is at present inactive: all of its members are in the service of their country. In summary form, the record of men on active duty is: In the Navy, 884; in the Army, 511; in the Coast Guard, 394; in the Merchant Marine, 38; total members in Service, 1827.

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SPEAKING OF NAVIGATION

(Continued from page 79)

you but an aircraft carrier is as dependent on the wind as a sailing vessel. True, she does not get propulsion from it but her courses and speeds are dictated by the breeze. The dependence is in a reverse sense; it is easier for us to get to windward than it is to get to leeward. Our maneuvers on a day the course is set down wind, trying every trick to launch and recover quickly, to foresee the wind strength and use the minimum speed possible away from where we want to go, would look strangely familiar to anyone who has worked to windward in fickle airs. It is noticeable that officers of the deck who have had sailing experience do better at this work than others. I wish they all had it. Some day, when it is time to turn into the wind for flight operations, I am going to yell: "Hard alee!" and see what happens.

I think the most interesting part of YACHTING these days is the section on cruisers for post-war days. Design is my greatest interest, anyway. I think they have all been good boats. But, as a champion of shallow draft, I must protest against the description of *Sailfish* by R. T. Miller in the July issue. He describes her 4′ 2″ draft as "moderate, to permit the owner to gunk hole to his heart's content (in the Chesapeake)." Personally, from my experiences there, I would describe four feet as deep draft. And *Sailfish* would never get into my favorite holes with half that. My favorite course (to Oxford to visit Ralph Wiley) led *Sara Reid* over miles of flats not over three feet deep. And the prettiest creek near Annapolis has an entrance that would pass us only at high water.

Sincerely,

R. P. BEEBE,
Commander, USN

The opinions or assertions contained herein are the private ones of the writer and are not to be construed as official or reflecting the views of the Navy or the Naval service at large.

HOW TO BUILD A HALF MODEL

(Continued from page 81)

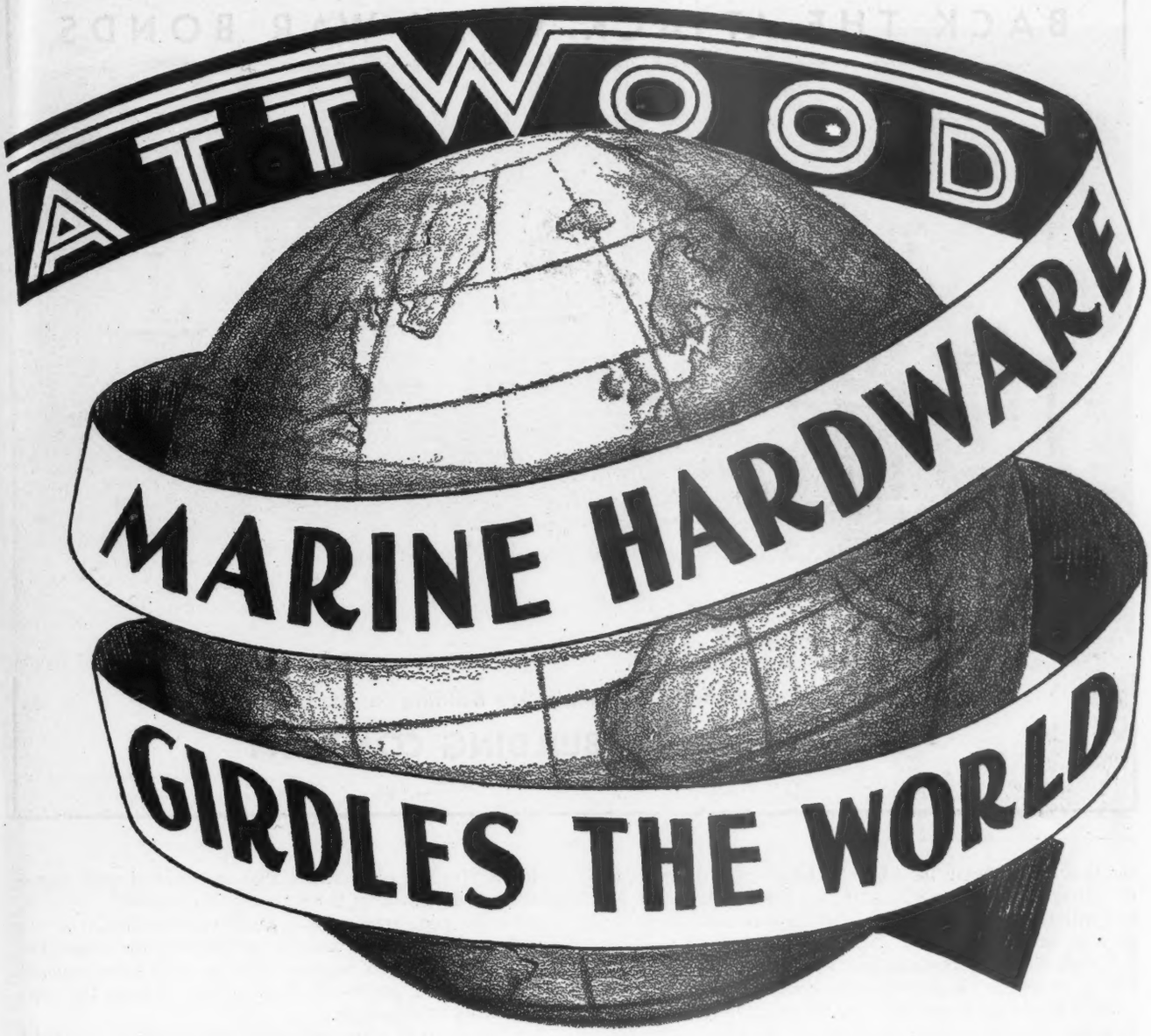
does not spread easily, to thin it down a little with clean turps. If it dries too slowly a few drops of Japan drier may be added. The can should always be thoroughly stirred with a clean stick before each using. Before closing the can, the groove into which the cover fits and the lip on the lid should be wiped clean of paint. The lid should be pressed on firmly.

The model should be given four or five coats of enamel, each coat rubbed down with either 7/0 "wet-or-dry" sandpaper, soaked liberally in water or a small piece of rubbing felt and fine pumice powder, also used with generous quantities of water. The felt and pumice may be bought at any good paint store. The enamel should be rubbed until it presents a perfectly smooth, eggshell finish, quite free of the minute lumps caused by dust settling while wet. When the white has been finished to your satisfaction, the color may be attacked.

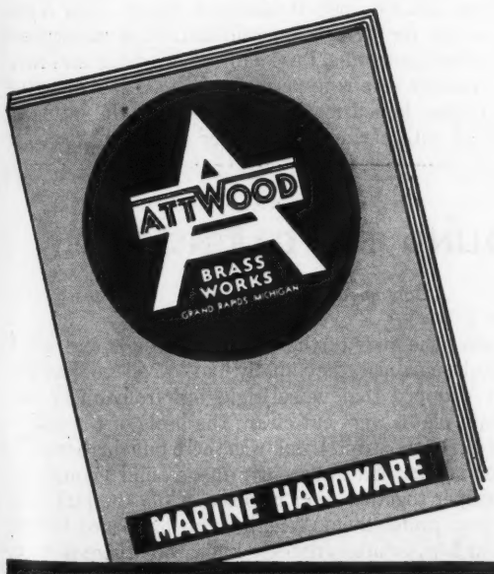
Before moving on to the topsides and bottom it will be necessary to mark the edges of the boot-top. The model must be held with its waterline parallel with the surface of the work bench on which you are working. A parallel clamp clamped to the holding block is a good way to do this. A pencil, with a very sharp point, clamped to a little jig, which can be made for the purpose in a few minutes, should be moved carefully from one end of the model to the other, care being taken to mark the line very lightly. Repeat the process for the other border of the boot-top, introducing under the jig a shim equal to the width of the finished boot-top, raising the pencil point the required amount.

Now, if you can get some of the narrow cellulose gummed tape that they used to sell in the 5 and 10 for wrapping Christmas packages, it makes an ideal masking tape for protecting the white boot-top while the black topsides are painted. If this tape is not available, then the usual Scotch tape, split in half to be about ⅜″ wide will do. Lay the tape carefully, commencing at

ATTWOOD



MARINE HARDWARE GIRDLES THE WORLD



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the bow and covering the white boot-top up to the pencil line indicating its upper edge. Be sure that the tape is in firm contact with the surface, otherwise paint may run under it and spoil all your careful work.

For all colored work on models, I use Automobile (or Coach) Colors, ground in "Japan" (not the country, the liquid), they come in handy tubes and will keep for years. Very small quantities are required. Squeeze out about ¼" of paint onto a palette of any sort, add a little turps and work it with a palette knife until the paint is as thin as skimmed milk, then add one or two drops of linseed oil and work that in also. This paint will dry in a few hours, with a dull finish, and one coat should be sufficient. This coat should not be rubbed as it is only for color and would rub off, being so thin. The varnish coats that come later will be well rubbed, however. The rail and deck should be varnished and rubbed at the same time as the topsides.

When the topsides are finished, remove the tape, turn the model over and repeat the process described in the previous paragraphs for the bottom, except that instead of using the Automobile Color, the surface will be covered with a coat of thin varnish. The bronze effect is produced by dusting bronze powder (which may be bought at any paint store) onto the tacky varnish with a soft camel hair brush about 1" wide, taking care that none of the hairs from the brush adhere to the varnish. This produces a very bright finish and should not be varnished. Another way to do the bottom is to mix the bronze powder with the varnish. This does not make as attractive a finish but is slightly more durable. For models that are to be sailed, it is the only safe way to use bronze powder, unless you use a regular bronze bottom paint.

For the final finishing of any enamelled or varnished surfaces, the best results are obtained by the use of rotten stone and ordinary machine oil, applied with a pad of soft cotton cloth and rubbed gently until the surface takes on a beautiful, smooth finish with that hand rubbed effect, so much admired in fine furniture. Do not rub surfaces that are finished with bronze powder, as described for the bottom of this model.

If you are going to mount your model on a back board be sure that the waterline of the model is parallel with the edge of the board. If you elect to dispense with the back board, simply insert screw eyes into the deck about 1/16" in from the edge, drilling holes to receive them.

A white celluloid plate looks very well attached to a model board, usually under the bow, giving the name of the boat, the scale of the model and any other data that may be appropriate. The S.S. Stafford Ink Co., 609 Washington Street, New York City, makes an ink for writing on celluloid. It is waterproof when dry but is hard to handle. I use a fine pointed pen and turn it so that the concave side is uppermost. It makes quite satisfactory name plates. Pencil marks, used to align the lettering may be wiped off with cleaning fluid after the ink has set for several days.

AROUND THE CABIN LAMP

(Continued from page 38)

"Checking over the ends of the dangling shrouds and what fragments of deck remained, they finally had to believe that the ice had simply chopped that vessel right out from under her masts! The chain plates were cut clean; the heels of the masts were gone; the top of the cabin trunk was there but there wasn't anything under it! Ice had apparently made solid enough to hold her tophamper together, and in place, while the hull had just gone out from under them. Whether this happened before she was taken in tow, or after, nobody knew, but there it was; the vessel was lost, and her masts sailed home!"

The doryman looked stunned as the Skipper concluded; even the cook had no comment to make.

JOSEPH CHASE ALLEN

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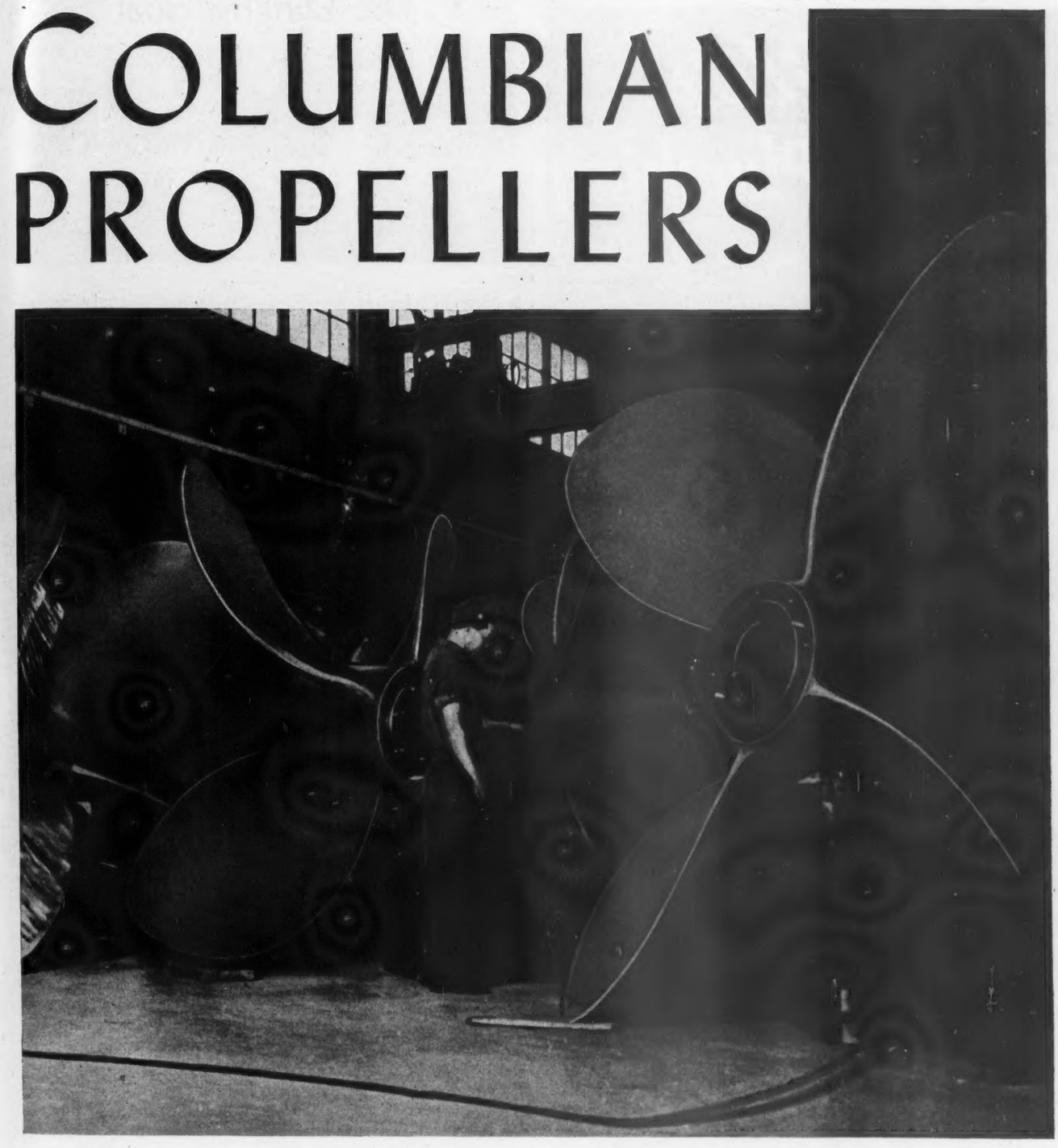

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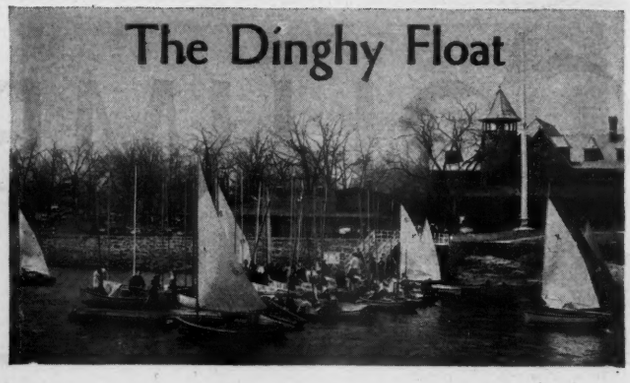


▶ Here, with high hopes, some misgivings and a signal of appreciation to all and sundry who have given a hand, is the first appearance of a new Department. It has a single objective, and that is to serve as a forum of news (other than that carried in existing departments), comment, ideas and occasional debate about anything and everything relating to sailing dinks. Comments and contributions from interested readers will be most welcome, as will both plans and photographs.

▶ From W. J. H. Dyer comes the following observations on the pros and cons of the lug *vs.* the jib-headed rig. "Way back in the good old days," he writes, "when dinghies were raced for fun and winning was a secondary consideration, the standard rig on the Ratseys and Dyers was a semi-balanced lug of 72 square feet. This sail was hoisted by a single halyard which also acted as a headstay. The rig was so simple that a child could ship and unship the whole business with little effort and less thought. It was a good rig, too, as Ernest Ratsey, Bill Taylor, Slim Baker and a lot of the other charter members of the Frostbite Y.C. will testify. Fun and simplicity were the keynote in those days, but complications arose when that old demon 'speed' was projected into the picture.

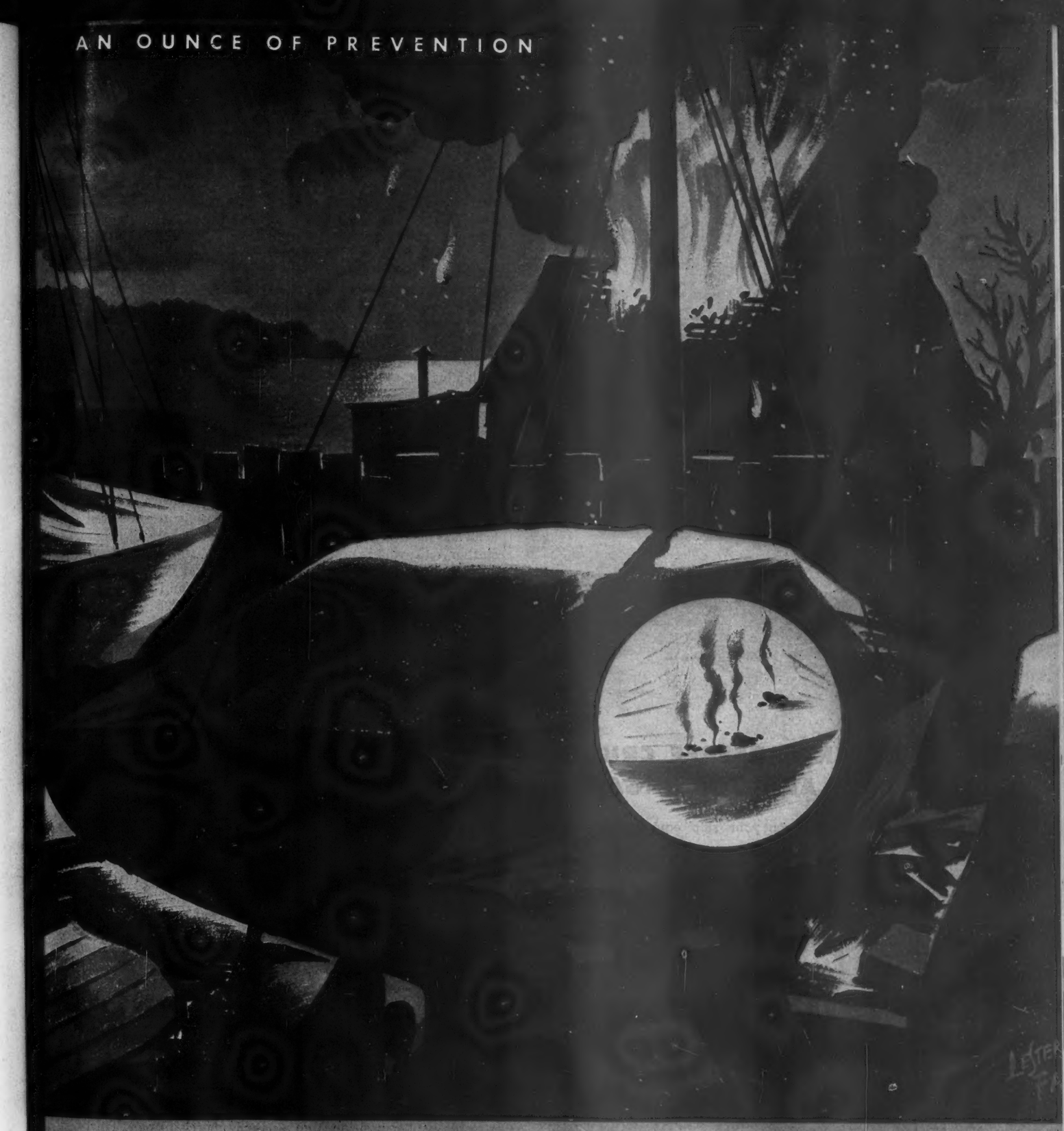
"About this time some chiseling on hull lines started and, as a result, the original 'A' Utility Class continued as a group and the newcomers were placed in an Open Class 'B'. As this class grew, so did the gadgets. New rigs blossomed out week after week — sliding gunters, fishpole marconis, gull winged curved yards, etc., including fancy staying of every variety. Boats that cost around $250 at the time that the class was established had to compete against racing machines costing $1,000. The result was obvious — the class folded, but not before a lot of valuable information had been gleaned.

"After the heat of class consciousness subsided in the early days of the North American Dinghy Association, three classes (all One Design) held the spotlight. The smallest class, but largest in number of boats, is the 10′ Class 'D' Dyer dink. A utility tender with a 'refined' lug rig of 66 square feet. Next came the One Design 'B' Class dinghy which carried a loose-footed, jib-headed sail on a scarfed marconi mast, with appropriate staying. This is an out-and-out racing class 11½′ o.a. carrying 72 square feet of sail. The 'X' Class is of the same length, type, rig and sail area but with utility qualifications of hull form. They went the former class one better by rotating their masts by means of a mast tiller and tiller lines.

"The most recent class developed under N.A.D.A. sanction is the 12′ International One Design. This is also an out-and-out racing class, with the hull formed of molded plywood and a rig so complicated that it takes two four-armed paper hangers to sail it in keen competition (ask any competitor in Intercollegiate dinghy racing circles).

"Based on a moderate amount of experience since completing the first American-built 'Frostbite' sailing dinghy, I claim that 75 per cent of all the so-called 'improvements' in sail and rigging of dinghies are 'bunk.' I'd like to see developed a hollow, molded plywood, scarfed-joint mast routed out to take the luff boltrope. This would substantially reduce the weight aloft, permit easier stepping of the mast and allow the boat to be left with the mast in place, unattended, without fear of capsize from every puff of wind. Thereafter, I'll agree to the value of attendant gadgets but, until then, I'll take the lug rig for all-'round use. At least

AN OUNCE OF PREVENTION



It's Busy—and Dangerous

on the water fronts these days. Boats laid up for the winter are exposed to a multitude of hazards. Seldom has the need for adequate protection been greater. Because caring for what we have is the rule of the day, "adequate protection" does not only mean provision for cash settlement should damage occur, but sensible prevention of that damage. So the Chubb & Son service, important to you in peacetime, is doubly valuable now. Have you done everything possible to prevent damage to your craft? Our new booklet, "The ABC of Yacht Insurance," contains many interesting suggestions on boat care under present conditions. Send for it today.

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one has a chance, when racing with the lug rig, to smoke occasionally or spit to windward; with the other rig, one's hands and mouth are always full of ropes."

▶ From an anonymous skipper who signs himself "Recali Ball" comes a further thought on the subject. "I would be the first to admit," he writes, "that a lug rig, with that heavy sprit, can be set perfectly. But I will never admit that it will stay that way longer than five minutes. You can still sail after it has sagged, of course—but you won't point.

"I remember dropping a sail, due to a sloppy halliard knot, just before a race on Biscayne Bay. We unstepped the mast, rove the halliard, hoisted sail, and followed the fleet around for our one point. I doubt if we could have reorganized any faster with a lug rig, especially if that sprit had landed on our heads!"

▶ Gordon Douglass reports the following news of the International 14s. . . . "George Ford, of Rochester Y.C., has just sold his perennial champion *Venture* to Blair Johnston, of San Diego, who reports that he is still in the market for a molded hull. It looks as though George also has his eye on a molded hull, if and when. . . . From the Cleveland Y.C. we learn that Russ Jack, vice-president of Jack & Heintz, Inc., has just acquired a Douglass molded hull from Colonel George Sackett, of Mentor Harbor Y.C., who is now on active duty. . . . Bill Lapworth, formerly of Detroit, won the summer series at C.Y.C., closely followed by John Brennan in *Jay Jay*. . . . John Lovett, of the Vermilion B. C. is working on his molded hull *U. S. 191*, and is considering christening it *Wee Lovett*. . . . *Foxy Too* won the Lake Erie championship of the I.L.Y.A. at Put in Bay sailed by Sandy and Mary Douglass. Skippered by Mrs. Douglass, she also carried off the Vermilion summer series.

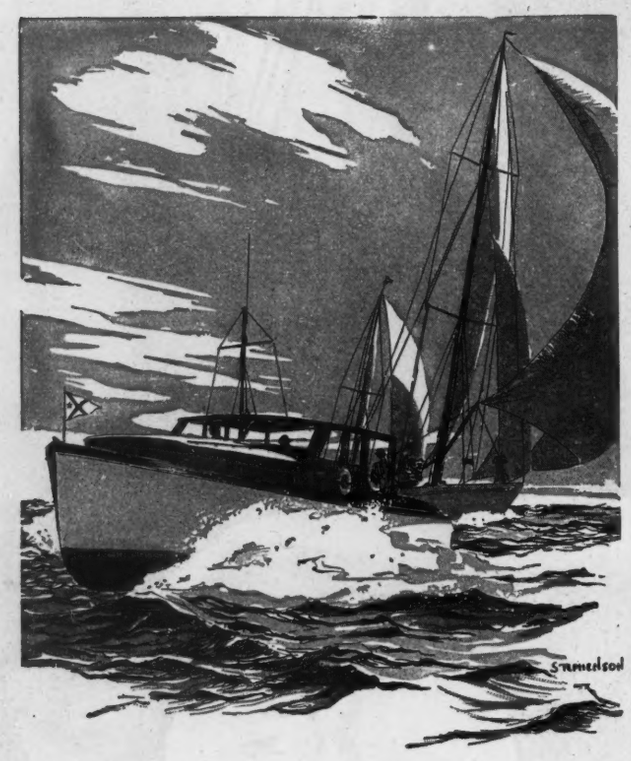
UNDER THE LEE OF THE LONGBOAT

(Continued from page 84)

is depicted scudding swiftly before a fresh breeze in the open sea. The sail billows full and taut, as a fisherman holds the guy rope guiding the craft homeward with its load of fish. Three young boys arranged on various parts of the deck and lending their weight at the proper angle to keep the boat in balance, are the crew. The sturdy craft with its lee rail awash responds to the course of the helmsman with a forward rush — and the whole picture is instinct with tensity and movement." Maybe I'm jealous of Carlyle Burrows, the art critic who perpetrated this paragraph, because despite his apparent ignorance of sailing and its terminology he has nevertheless contrived to make the picture seem lively and attractive.

The one about the YMS that was caught in a northeast gale that piled three or four freighters on the beach near the entrance to New York. She hove to in it for twelve or thirteen hours, and stood by a disabled SC for another length of time and, when she was about to square away for her destination, was so fortunate as to receive her position from a passing merchantman. Thirty minutes later, along came another freighter and requested her course and distance to New York. Like a flash the skipper of the YMS yelled it over to her and, like a gentleman and a scholar, the captain of the freighter shouted back: "Well done, Navy. Always on the ball." I only hope that that freighter wasn't one of those that hit the beach.

And then there's the one about the quick-witted signalman of the ill-fated *Moonstone*, sunk by collision with another Naval unit. The crash catapulted him to the forecastle deck of the ramming vessel and, as the latter backed off and an officer felt his way forward in the darkness of midnight, the signalman shook himself and found that he was unhurt. "What ship was that?" asked the officer, thinking the signalman was one of his own crew. "The *Moonstone*, sir." "How do you know?" asked the officer. "I got transferred off her," said the survivor. "You did — when?" asked the officer, with some skepticism. "Just now," said the signalman. "Not two minutes ago."



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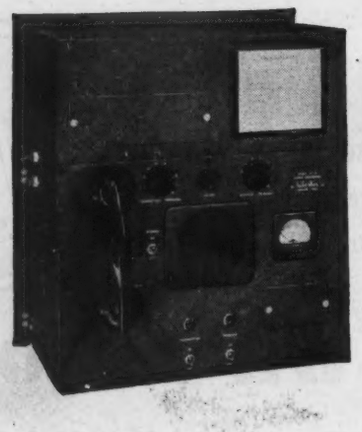

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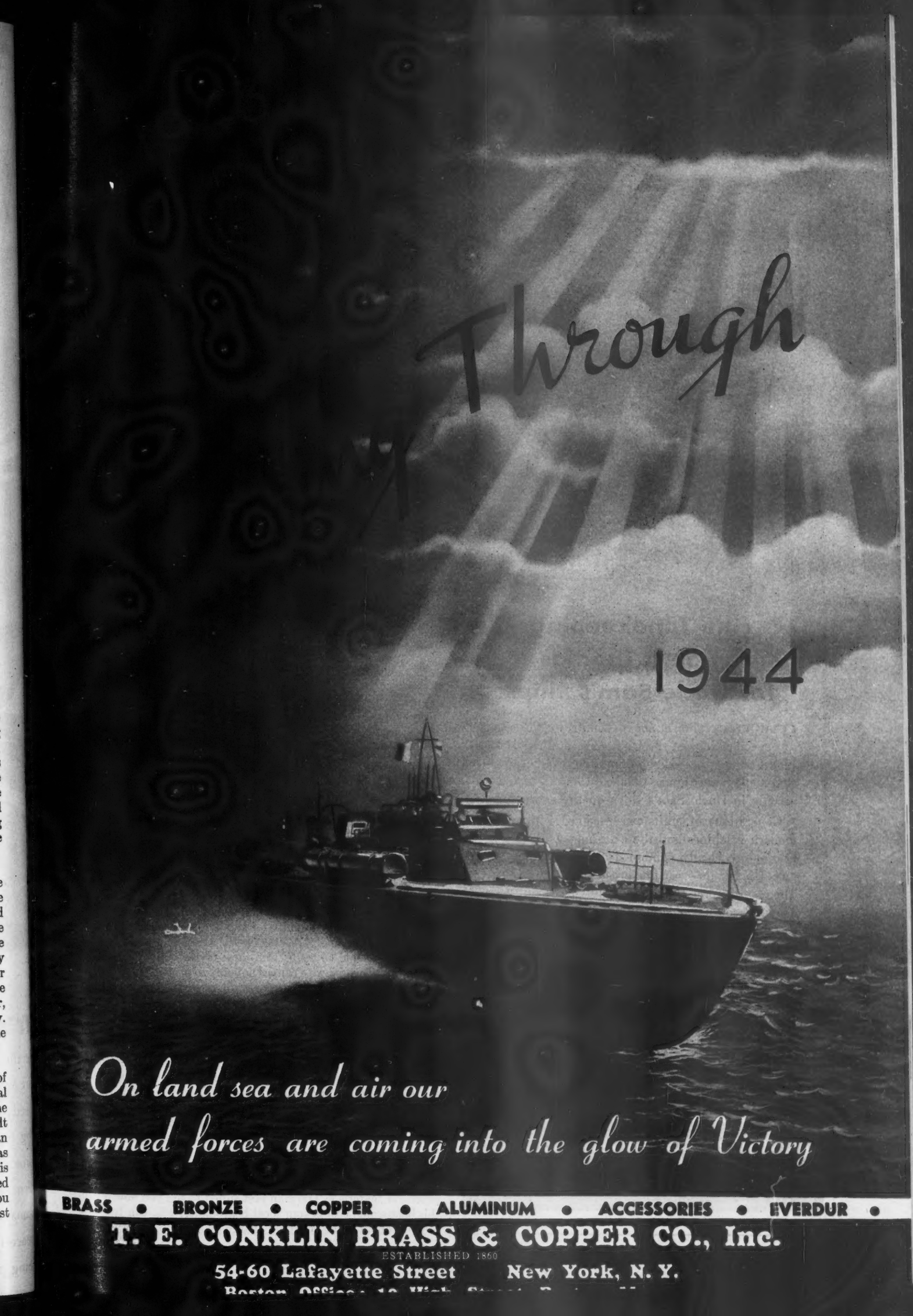

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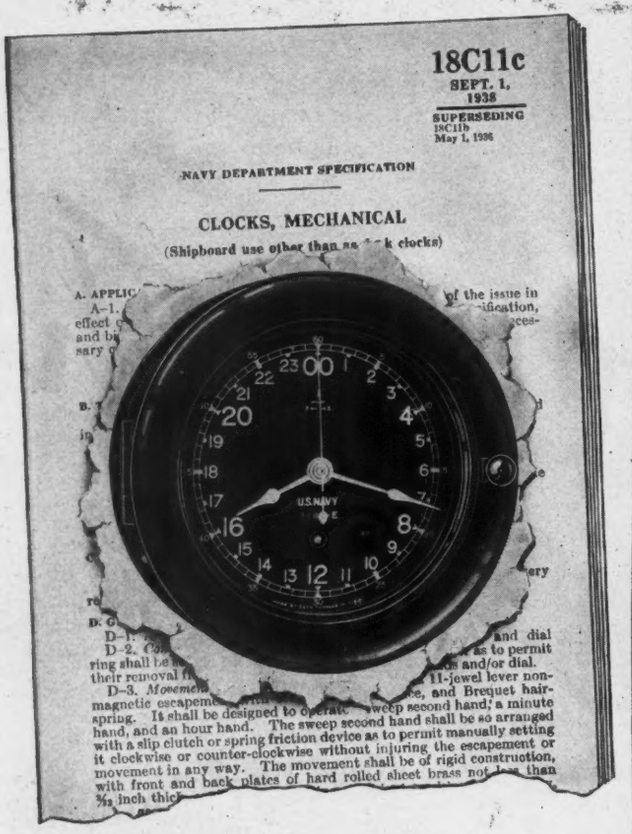
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SEPT. 1, 1938
SUPERSEDING 18C11b May 1, 1936

NAVY DEPARTMENT SPECIFICATION

CLOCKS, MECHANICAL

(Shipboard use other than ... k clocks)

A. APPLIC... of the issue in ...ification, ...ceas-

D-1. ... and dial
D-2. ... as to permit ... and/or dial.
... 11-jewel lever non-
D-3. *Movement*. ... e, and Breguet hair-spring. It shall be designed to operate ... sweep second hand, a minute hand, and an hour hand. The sweep second hand shall be so arranged with a slip clutch or spring friction device as to permit manually setting it clockwise or counter-clockwise without injuring the escapement or movement in any way. The movement shall be of rigid construction, with front and back plates of hard rolled sheet brass not ... than ... inch thick

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SELF-STARTING ELECTRIC OR KEY-WOUND

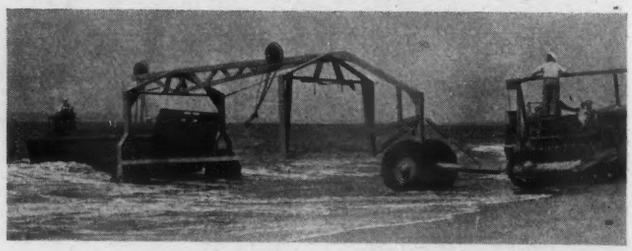
PACKARD'S PT ENGINE SCHOOL

(Continued from page 82)

aircraft specifications that yielded astounding power per pound of weight. Early trials proved engine acceptability and, by the end of 1939, volume production was initiated. Less than a year later, with the doubling and redoubling of engine orders, came the Navy's request for an engine school.

Now that PTs are increasing in number and activity, a new educational need has arisen for a quick and easy expansion of engine instruction methods. Working closely with the Navy, the school heads and instructors have developed a visual training "kit" of films, records and charts. It serves as a capsule condensation of the engine course and is the next best thing to actual school attendance.

Whether amid the williwaws of the Aleutians, on a coral strand in the South Pacific or off the blue of the Mediterranean, PT bases now see these training "kits" in active use. Thus, in effect, the alma mater of many a PT expert broadens its campus to give his shipmates the world over instruction on the source of the power and speed that spells their PT success.



"Jimmy," one of the Navy's new salvage vehicles for landing craft

A SMALL POST-WAR CRUISING CUTTER

(Continued from page 89)

it clear of the hull. As soon as the anchor is off the bottom, fill away and, as you raise the anchor, until it is just about awash, it is cleaned off for you. When it is finally clean, you can easily lift it aboard without getting mud all over the topsides and deck. These little bowsprits are neat gadgets.

The hatch over the forward berth is a nice thing to have and it might be the means of saving life. I don't like a one exit cabin — not with cook stoves and gasoline engines in the same boat — and I have provided an opening at each end so that you can always get out. Furthermore, that little hatch may be used for a great many other purposes. You can hoist your spinnaker in stops directly from the bag on the cabin floor. The same thing applies to the big, overlapping jib. Or you can reverse the process and drop unwanted sails below out of the way, where they won't get walked on. By propping the hatch cover up, it will also make an excellent ventilator and will scoop in a surprising amount of fresh air.

The deck could be made from sheet plywood. If this is done, it should be covered with canvas not only to protect the plywood but also to make it look better. In all cases, the canvas should be carried inside the coaming of a hatch or the sides of the cabin trunk and then run up an inch or two and be tacked fast. An inside facer (trimming piece) will cover the edge. Since water will not run uphill, such construction should make for no leaks.

One of the first questions anyone will ask is the price of such a boat. Who knows? Perhaps in another few years we shall be paying ten dollars for a loaf of bread. Even in normal times, there would be considerable variation in the price of such a boat, complete. Some builders charge more than others and from them one can usually expect better workmanship and longer life for the boat. Then, too, materials are a factor. In a boat of this type, it would be quite possible to have the boat cost a thousand dollars more, simply because of using better and more expensive materials. The man best suited to tell you how much this boat would cost is your local boatbuilder, who can tell you roughly about what he would charge for the job.

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News from Yachting Centers

MASSACHUSETTS BAY FLASHES

By Ed Earle

▶ This season will be featured by the return of several big cruising boats. There has been considerable interest among owners planning to put auxiliaries back in commission. The fleet will be increased also by boats turned back to owners by the government, like the noted *Tioga* of Marblehead, now back at Dion's Yard.

▶ Sixty-two delegates were present at the November meeting of the Massachusetts Bay Yacht Clubs Association, Inc., held at the Savin Hill Y.C., which shows interest is still running high despite the war. The Junior Membership committee, headed by Eddie Gallagher, of Squantum, Commodore George Hamilton, of Pleasant Park, and Commodore Jim Lee, of South Boston, made an encouraging report. The Committee will hold a special meeting this month or February and act on a communication which has been sent to the 40 member clubs of the Association to determine the interest in promoting the junior movement. The balance of authority and full jurisdiction will still be with the individual clubs. The working together of member clubs will develop a unity of purpose and training of skippers that will do much to improve the whole sport of yachting.

▶ The Commodores of America, Inc., held their annual dinner at the South Boston Y.C. and brought a heavy turnout. Ex-Commodore John E. Murphy, of the South Boston Y.C., had charge of arrangements. Tony Bowker, of the Squantum Hustler Class, was the "hit" speaker of the evening.

▶ The Quincy Y.C. bought a good-sized piece of land, south of the Club, which is now filled with boats. The regular parking lot is also packed. Al Baker is getting ready to have his Sunday afternoon dinners in his power boat, high and dry in the yard aft of the clubhouse. The Club is open Friday, Saturday and Sundays during the winter.

▶ The sale of the former crack Star Class boat *Lucky Me* from John D. Sprague, of Milton, now in the Air Force, Blanding Field, to H. T. Lankford, of Wichita, Kansas, is a reminder of the days when the Stars were going strong at the Quincy Y.C. with a class of ten. The *Lucky Me* was shipped out to Kansas from John Goodhue's Boat Yard at Braintree Point, where she was built. Mattie Brothers built the hull of *Lucky Me* for John H. Burroughs, Jr., as he did those for three or four others in the ascension of the Stars. The hulls were taken to Goodhue's Yard where the young owners finished them under the weather eye of Goodhue. The mast and rigging were furnished by "Jack" Wood and the sails came from New York. Two of the Quincy Stars at Goodhue's, Alan Durkin's *Nala* and Bob Kirkland's *Tartan*, were built entirely by their owners. "Junie" Burroughs had a fine record and won plenty of silverware at the helm of *Lucky Me*. Burroughs sold her to Sprague, who had been sailing in the "S" Class at Marblehead. Then the war and the exit of the Stars.

▶ Ray Hunt, former Sears Cup winner and designer of the National 110's and 220's, has turned out a 31′ lobster boat, built at Goodhue's, which has proved the fastest thing around Cohasset. The lines are something like those of a U. S. Navy destroyer.

▶ The handsome new boathouse of the Community Sailing Association on the Charles River Embankment under the lee of the West Boston Bridge is still a busy place these winter months. A well-equipped and modern work shop has been recently added.

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UNROLL your *charts. Plot your peacetime course to Greenport, the old shipbuilding village on Peconic Bay, outstanding cruising, vacationing and fishing resort "where Long Island Sound meets the Sea."

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With peace, the Yard will revert to its proved pursuits of building, servicing and storing. The mass production of "stock boats" to sell at low prices, is not contemplated. Future Greenport built boats will be constructed to suit the individual requirements of owners. Besides embodying Greenport's traditionally fine craftsmanship, these new boats will offer the added inducement of moderate price — an achievement made possible by the extensive production equipment and advance prefabrication procedure of wartime.

Plan to build your new boat here — or to fit out, repair or store your present boat at this convenient location.

** See U.S.C. & G.S. Charts Nos. 299, 542, 578, 579, 1208, 1210, 1212 and 1213.*

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LAKE MICHIGAN BREEZES

By Warren T. Davis

▶ Brrrr Brrrr! Frostbite weather while this is being written, and iceboat weather when it reaches you. Talk floats through the clubhouses of who has bought which boat and of what kind of a yacht is really the best. A number of yachtsmen talking of motor sailers and others buying "Q" boats! Ned Sheridan showing pictures of power boats he might buy and his crew looking pained. Officers being elected and committees being appointed. Yes, there is still life in yachting on Lake Michigan.

▶ Milwaukee Y.C. had a great loss when, on November 23rd, their clubhouse was gutted by fire. The members' losses of equipment total about $12,000. Very little damage was done to the boats. Almost 50 years old, this clubhouse was a real landmark and was widely known to yachtsmen from many localities in addition to those on Lake Michigan. A strong wind kept the flames away from the seventy-odd yachts stowed next to the club. Fortunately, the building was insured for about $50,000. This club will be fifty years old this year, the clubhouse having been started in 1895 and completed in 1896.

▶ Michigan City Y.C. will have T. M. Blackwood for commodore in 1944, with O. E. Palm, J. G. Dean, P. T. Wineman, and V. H. Herbert as officers with him. Lloyd Cooper has purchased the 30′ Class D cruising cutter, *Wanderlarr*, designed and built by Campbell, of Holland, Mich.

▶ Over at Chicago Y.C., Ole Karas, one of the Lake's top-notch racing skippers, has bought *Caramia*, a Class Q boat, and is bringing her in from the East. Competition in this class will be stepped up another notch. Karas sold his part interest in the "Q" *Falcon* to Clare Udell, who now is full owner. Harry Nye, Jr., who chartered the Class R sloop *Gossoon II* from Mal Vail, has purchased the double ended "R", *Tobasco*, from Gould Davis, and Commodore Danly has chartered *Gossoon II* for the season. Herb Pusheck sold *Caheja II* to Jules Eahart.

▶ Chicago Corinthian Y.C., with clubhouse at Montrose Harbor, announced the election of Harold Hildebrand as commodore for 1944. He will have as assisting officers William Wingard, William Fisher and H. F. MacNeil. That old war horse, D. E. Hobelman, is not only retiring as commodore but also is retiring as editor of their very fine monthly club letter.

▶ The Great Lakes Cruising Club has won much praise for its Port Pilot and Log Book as well as for its Navigation school. Now there are plans afoot to record in color film the beauties of the cruising grounds in this area and, by next year, it is hoped that a reel or so of film will be available for loan to clubs wanting an entertainment feature. Eventually a library of films is to be accumulated.

▶ The Navy League Midshipmen program for 1943, in which 61 boats took part, gave instruction to 6,646 men. That's really a lot of men! The total man-hours involved amounted to 16,160. On the average, 85 midshipmen went out for "drills" held on 76 different days. Instructors talking two hours or more in the open, loud enough to be heard by all, knew afterwards by the feel of vocal chords that something had been said. For the most part, the talking and showing was highly effective and the midshipmen were enthusiastic about their experiences. Most of the young fellows were on the water for the first time in their lives. A great many yachtsmen also made a point of taking these men on weekend sails.

First honors for the most training trips went to *Teaser*, owned by Past Commodore Sheridan of the Chicago Y.C. Closely, very closely, followed by Ralph Atlass, owner of *Wind*. The final score *Teaser* 44, *Wind* 43. The program this year was again organized by Bud Snite, who worked in close coöperation with a number of yachtsmen now in the Navy on the staff at Abbott Hall, calm and cool Lt. Byron Willis being in charge for the Navy.

83′ Army Aircraft Rescue Boat

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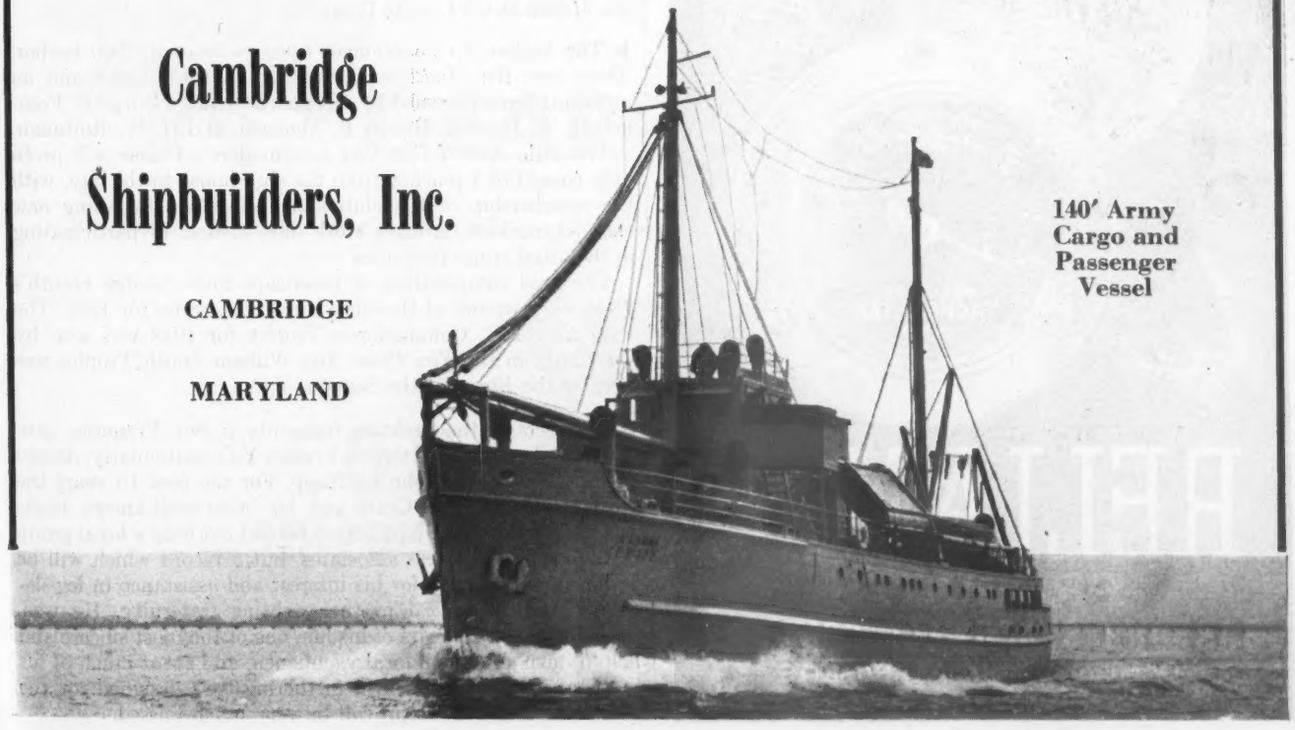

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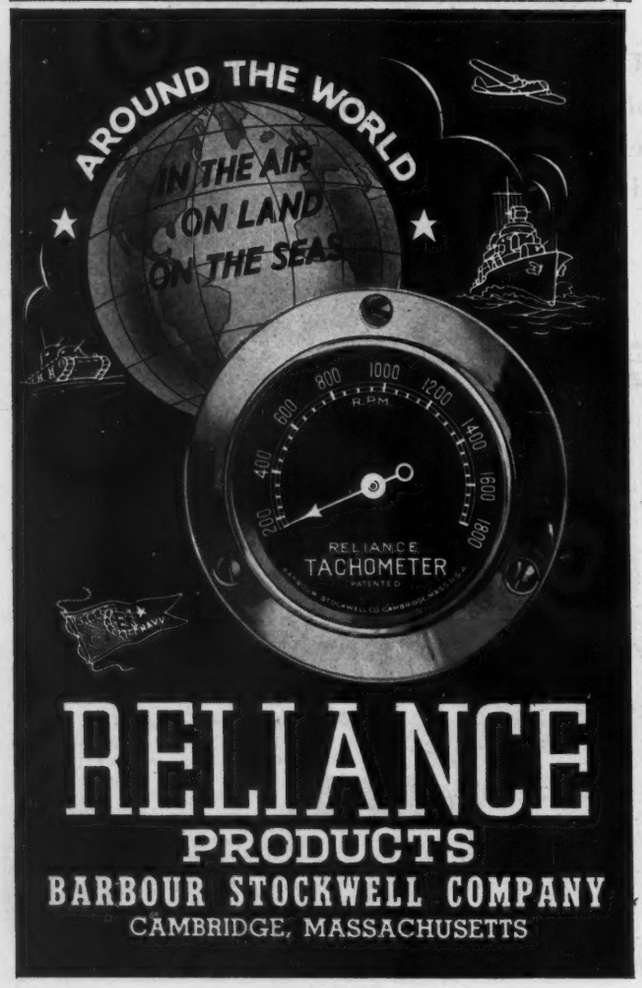

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BARBOUR STOCKWELL COMPANY
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FROM SAN FRANCISCO BAY

By Jesse L. Carr, M. D.

▶ Recording the sale of the famous yawl *Dorade* and announcing her departure from San Francisco Bay, is like writing the obituary of an old friend. Every yachtsman personifies his own boat, but *Dorade* had a personality which was endearing to us all, even when we were reading the name on her stern. Some of us can never forget the first view we had of her in competition from the deck of the much larger *Dragoon* as she passed us near midnight and in moonlight mixed with rain, bobbing along like a pintail duck and going fast to windward in one of the dirtiest seas that this dirty race could provide. She has been sold to Ralph C. James, Jr. of the Seattle Y.C., and will sail from there. Myron Spalding, who skippered her in the Honolulu Race, which she won, delivered her to her new owner a few days ago.

▶ The St. Francis Y.C., whose burgee was flown by *Dorade*, has announced as their flag officers for 1943: Ingraham Read, commodore; J. D. Fraser, vice commodore; Howard H. Hurst, rear commodore; Robert J. White, Moritz H. Haehne, and Stanlus Z. Natcher, Directors.

Colonel Gene Bennett has written from somewhere in China that he is again serving with his old Division Commander. "Buster" St. Gaudens, still overseas, is now a captain in the Army. Bill Simmon, of the Aeolian Y.C. and Lt. A. C. Hailander are now somewhere in the European area. Betty Brumbaugh has enlisted in the SPARS, and her sloop *Butch* will be tied up at the Palo Alto Y.C. for the duration. George Cleese, Jr., also of the Palo Alto Y.C., is now a flying instructor.

The Sequoia Y.C. has announced the new officers for 1944 as follows: Fred Smales, commodore; Bill Downey, vice commodore; Bob Elliot, port captain; Fish Scales, secretary-treasurer; George Guntli and Henry Bents, directors.

New officers for the Yacht Racing Association will be Nelson Jones, chairman; William LaViollette, secretary; and Morris Jaehne, treasurer. With the committee barely appointed, seven races have already been announced for 1944, and the regular events will doubtless be held.

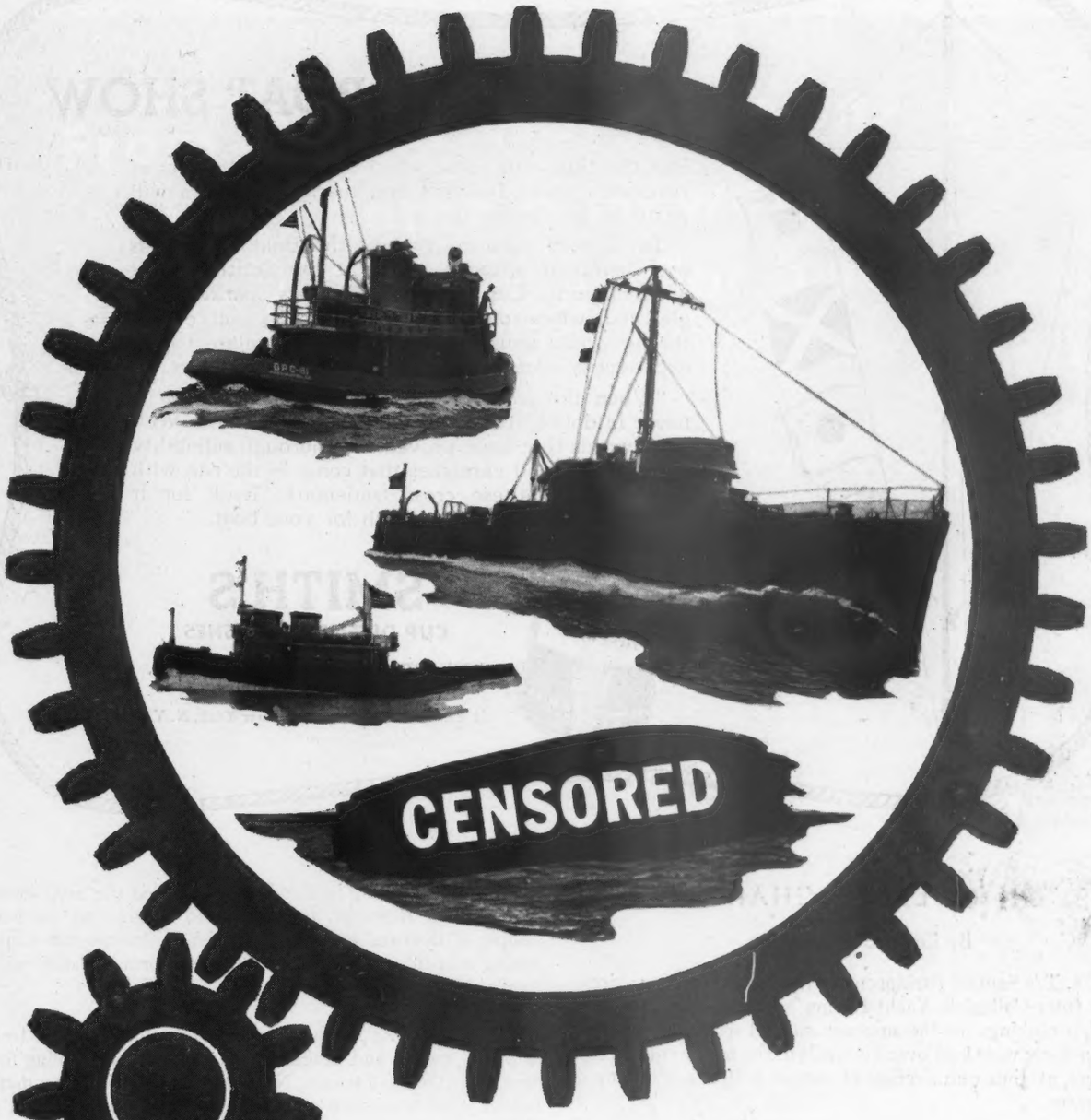
The turnover of old and new boats continues to amaze even the most hardened San Francisco Bay Yacht broker. The ketch *Namsang* has been reported taken over by the government. William Newby, of the South Bay Y.C., has bought a 26′ cruiser in Santa Barbara and has shipped her home by truck. Bill Robinson, of the Coyote Point Y.C., has purchased a 26′ power boat, and Leo Davis, of San Mateo, now moors the *Miown* at the Coyote Point Y.C.

▶ The Aeolian Y.C. announced five new boats in their harbor. These are: the *Madeline D*, *Norma*, *Barbara*, *Dutch* and an unnamed cruiser, owned by Herman Doehler, George F. Frenkel, R. W. Hansen, Robert B. Maclean, and H. W. Rothman.

The Palo Alto Y.C.'s Vice Commodore's Cruise will probably consist of a journey from the club house to the bay, with the membership of the club and their boats installing new channel markers during a work day, instead of participating in the usual cruise festivities.

The final computation of handicaps finds George Guntli's *Moby Dick* winner of this club's handicap series for 1943. The Palo Alto Y.C. Commodore's Trophy for 1943 was won by Ed Hardy in the *Fire Crest*. The William Smith Trophy was won by the *Elmac* of the Sequoia Y.C.

▶ Members of the yachting fraternity in San Francisco generally, and members of the St. Francis Y.C. particularly, deeply regret the death of John G. Rapp. For the past 10 years the local agent for Chris-Craft and for other well-known boats and accessories, Mr. Rapp leaves behind not only a loyal group of friends and business associates, but a record which will be enduring particularly for his interest and assistance in legislative matters beneficial to the yachting fraternity. He was, during the past 20 years of his life, one of the most sincere and helpful men among all local yachtsmen, and spent much of his personal time and money in furthering laws designed for the good of sailing. Mr. Rapp will be very much missed.



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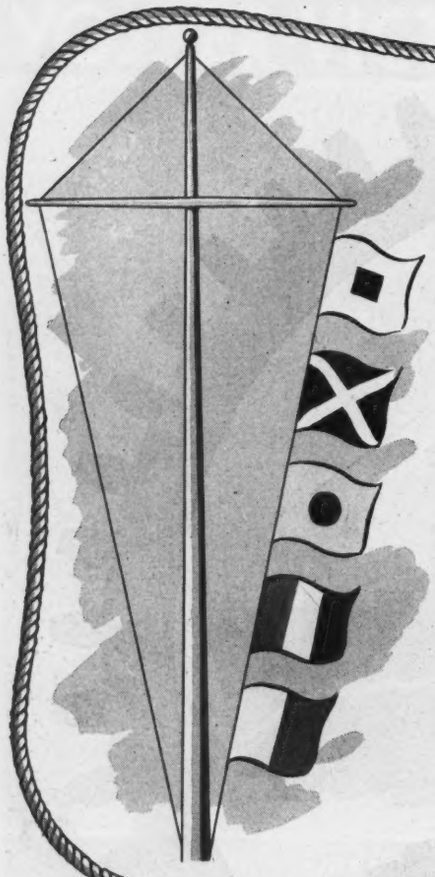

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ON COLLEGE CHARTS

By Leonard M. Fowle

▶ M. I. T.'s Samuel Parkinson emerged as the leading skipper of the Inter-Collegiate Yacht Racing Association in the helmsmanship rankings for the summer and fall seasons. Parkinson holds a fairly wide lead over his rivals in the top twenty college skippers, attaining an average of .500 or better in a minimum of 20 races.

▶ The figures on the fall and summer racing seasons, as compiled by the I.C.Y.R.A.'s Secretary, give the following rankings for the first 20 skippers meeting the requirements:

Rank, Skipper and College	*Perc.*	*Rank, Skipper and College*	*Perc.*
1. Parkinson, M.I.T. (20)	.834	11. Roy, C. G. (27)	.709
2. Burton, Harvard (40)	.7881	12. Macdonald, Holy Cross (22)	.698
3. Ogden, Holy Cross (21)	.7876	13. Henshaw, Tufts (42)	.681
4. Hildebrandt, C. G. (21)	.784	14. Gallagher, Tufts (28)	.670
5. Boericke, M.I.T. (41)	.762	15. Taft, M.I.T. (35)	.634
6. Daniel, C. G. (33)	.761	16. Aldrich, C. G. (22)	.597
7. Daly, Yale (22)	.758	17. Starkweather, Brown (21)	.553
8. O'Day, Harvard (49)	.739	18. Bacon, Northeastern (38)	.552
9. Lewis, Yale (31)	.723	19. Paradis, Northeastern (31)	.540
10. Fontaine, C. G. (41)	.714	20. Somerville, Yale (22)	.502

Note: The figure in parentheses denotes the number of races each skipper has sailed.

▶ Seven of these 20 skippers finished their intercollegiate yachting careers with the fall season and, as a result, the strength of most teams, Coast Guard and Yale excepted, will be altered when the spring season opens in April. M.I.T. loses Hal Boericke and Jack Taft by February graduations; Tufts' No. 1 skipper, Johnny Henshaw, will be a V-12 graduate of about the same date; and Johnny Burton, of Harvard, Arthur Ogden, of Holy Cross, and Lewis Bacon and John Paradis, of Northeastern, all received their sheepskins in the late Fall.

▶ The I.C.Y.R.A. did not hold a mid-winter meeting in New York City during the Christmas vacation period this year as the October meeting in Cambridge obviated the need for such a gathering. However, the Executive Committee has held a couple of informal meetings to assist in drawing up a spring racing schedule which, in its tentative form at least, will be available to member clubs.

▶ In very strong northwest winds providing a hard test of skippers, crews, and dinghies, the Coast Guard sailing forces concluded their fall season, November 14, by winning a double-header. One team won a triangular regatta from Brown and Tufts with a score of 104½–91½–73 for the respective contestants, and another defeated Stevens Tech in a dual meet by 67–41. "Mitch" Daniel was high point skipper in the first match, although Brown's Johnny Brown and Charles Ill, the latter a V-12 transfer from Yale, made the competition keen until the final race. George Warren, scoring 27 out of a possible 28 points, was high man for the Cadets against Stevens.

▶ Robert Horrigan, a member of Inter-Collegiate Y.R.A. executive committee, has been elected commodore of the Nautical Association of M.I.T., succeeding John R. Taft, retiring president of I.C.Y.R.A. The Tech dinghies will blossom forth in the spring season with new sails, as canvas has been ordered for the 38 regular 12-foot dinghies. The Nautical Association of M.I.T. is one member organization which has enjoyed an expansion of membership during war-time, due to the enthusiastic co-operation of the commanding officers of the Navy's V-12 and Army's A.S.T.P. units at Tech. M.I.T.'s membership this past summer and fall approached 900.

▶ College yachtsmen will note with interest the new column, "The Dinghy Float," in the current issue of YACHTING. Many matters of concern to college dinghymen, whether dealing directly or otherwise with intercollegiate sailing, are certain to be discussed in this new feature, edited by two friends of the I.C.Y.R.A., Hampton de Fontaine and Critchell Rimington, who will welcome contributions from college yachtsmen.

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LONG ISLAND SOUNDINGS

By Starboard Tack

▶ For the sake of the record, and to give credit where credit is due, the annual class championships of the Long Island Sound Y.R.A. are here summarized: *International Class:* 1st, *Patricia*, Arthur P. Davis; 2nd, *Four Winds*, Arthur Knapp, Jr.; 3rd, *Aileen*, Cornelius Shields. *S Class:* 1st, *Kandahar*, Philip S. Patton; 2nd, *Auley*, W. S. Chesley, Jr. *Atlantic Class:* 1st, *Teal*, John S. Sutphen, Jr.; 2nd, *Rumor*, Mills S. Husted. *Victory Class:* 1st, *Alouette*, B. Glenn MacNary; 2nd, *Nike*, Kurt Grandpierre. *Handicap Class, Div. V:* 1st, *Valkyrie*, Stuart E. Kay; 2nd, *Aries*, E. C. Waldvogel. *Star Class:* 1st, *Armade*, Arthur M. Deacon. *110′ Class:* 1st, *Hobby*, Harry Herbert. *Handicap Class, Div. VII:* 1st, *Sufi*, Rodney Ollinger. *Coastwise Cruiser Class:* 1st, *Lucky Star*, R. O. H. Hill. *Comet Class:* 1st, *Bud*, Charles Ely Rogers.

▶ H. Schieffelin Sayers, long a familiar figure in Long Island Sound yachting circles, passed away early in December. A former commodore of the City Island Y. C., and, for many years, chairman of that club's regatta committee, it was only recently that he had given up active competition. He was the owner of the well-known *Narwhal*, which, in 1931, was the only yacht to finish the 130-mile Cornfield Lightship Race, which was sailed in particularly heavy weather. Mr. Sayers was the treasurer and director of the Minneford Yacht Yard, Inc., of City Island.

▶ The Manhassett Y.C. was the scene of the 13th Annual Frostbite Regatta on Saturday and Sunday, January 1st and 2nd. Further news of this sub-zero dinghy classic will be reported next month. A calendar tabulation of the November matches of the Larchmont dink enthusiasts reveals the following top scorers:

November 21st: Morning races — *Ordeal*, Howard McMichael, 29 points; *Sissy*, Cornelius Shields, 27 points; *Paralysis*, J. M. Odell, 27 points. Afternoon races — *Ordeal*, 93 points; *Rum Dum*, Jack Sutphen, 87 points; *Stinger*, Warren Tomlinson, 85 points.

November 28th: Morning races — *Rum Dum*, J. S. Sutphen, Jr., 26 points; *Stinger*, W. A. Tomlinson, 22 points; *Mum*, J. W. Charlton, 22 points. Afternoon races — *Rum Dum*, 106 points; *Ordeal*, Howard McMichael, 103 points; *Sissy*, Cornelius Shields, 100 points. December 5th: Morning races — *Felix*, Patrick O'Gorman, 26 points; *Rum Dum*, J. S. Sutphen, Jr., 24 points; *Mum*, J. W. Charlton, 24 points. Afternoon races — *Rum Dum*, 48 points; *Stinger*, Warren Tomlinson, 39 points; *Sissy*, Cornelius Shields, 37 points.

▶ The Annual Cruise Dinner Dance of the United States Power Squadrons will take place on Saturday evening, January 15th, at the Hotel Astor, New York.

▶ The Girl Mariners of Larchmont have named their new troop *Zaida*, in honor of the Ratsey's famous cutter. . . . The entire 1943 slate of the City Island Y.C. was reëlected for the coming year. Commodore, Critchell Rimington; vice commodore, Carl Buhr; rear commodore, Gustav I. Steffin; fleet captain, Seward Dehart; fleet surgeon, Dr. Hugh Darby; measurer, Alvin Mason; financial secretary, Arthur Gauss; recording secretary, George Chadwick; treasurer, Theodore Kaufer. . . . One hundred and thirty-six members of the American Y.C. are on active service.

January, 1944

Dear Dealers and Friends:

Ordinary times we would be meeting at the boat shows to exchange ideas. In the absence of these shows for the duration, I would like to convey to you in as few words as possible that which you can expect from the Foster Boat Company's three plants.

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For me to begin to tell you of the many advanced ideas in our Dream Boats of tomorrow would take far greater space than is available. When sending in your name and address for pictures and literature, please specify whether you are interested in franchise or private ownership.

May we wish you a Happy New Year and the safe return of our loved ones from the fighting fronts.

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President

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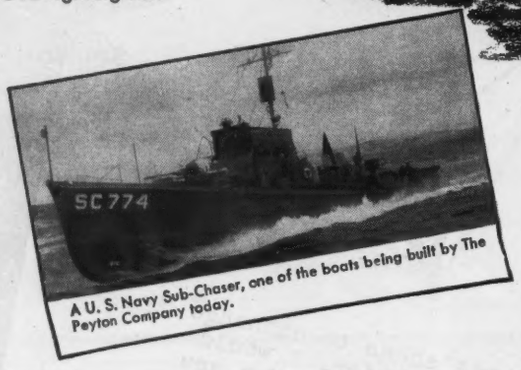

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LAKE ONTARIO NEWS

By W. Peck Farley

▶ The dinghy sailors at the Royal Canadian Y.C. are holding up their end. First Lieut. Les W. Scott, R.C.N.V.R., well known in international racing in the 14-foot Dinghy Class, is back in Toronto at H.C.M.S. *York*. Les is one of the top flight Canadian dinghy skippers and has represented the R.C.Y.C. successfully in many of the International races for 14-foot dinghies.

Lieut. Commander Hugh J. Plaston, R.C.N.V.R., prominent "R" boat sailor, is at present Executive Officer at H.C.M.S. *York*.

Lieut. Birk Hynes, R.C.N.V.R., graduate of the Jr. Club at Royal Canadian and dinghy skipper in the Sr. class, is now commanding one of the new Canadian corvettes, and last summer brought his ship into Toronto harbor for a short stop on the way to salt water. Quite a difference between skippering a 14-foot racing dinghy and being in command of a Canadian fighting ship. Mighty glad that he and his ship are on our side.

Lieut. Douglas Trowe, R.C.N.V.R., of C Class fame is Executive to a high ranking naval officer.

▶ The Youngstown Y.C. has planned an extensive cruising program for the 1944 season. The regatta committee, under the following men, Chairman C. J. Spaulding, E. J. Doyle, W. A. Cannon, Sr., G. D. Bagley and Henry Yale, is already working out plans for the coming season. There will be the Youngstown to Port Dalhousie race for the Tycoona cup; Youngstown to Toronto via Olcott for the Bangalore Cup and the race from Youngstown to Olcott and return for the Cayuga Cup. Regular Saturday and Sunday series on the local race course will be cut down because of the shortage of crews. Youngstown is again planning on holding the Presque Ile and Bay of Quinte cruise in July and members of any other clubs who are interested in joining in should contact "Chuck" Spaulding for further details.

▶ Algonquin Y.C., on Irondequoit Bay, had 13 Lightnings this past season as compared with 7 last year, and they made an excellent showing.

The Charlie Pehle Commemorative Trophy was won by Algonquin. This is a handicap race open to all the boats on the bay, Comets, Snipes and Lightnings. Charlie Pehle was the man who taught most of the men on the bay to sail when they were youngsters.

Herb Sinnhofer won the Summer Series in the Lightning Class and also the Club Championship. Bill Straub won the Spring Series, and the Fall Series went to Dr. McIntosh, both in the same class.

Dick Claver won the Comet Championship.

▶ The Royal Hamilton Y.C. has just finished a most successful sailing season climaxed by a Sailor's dinner at which 160 enthusiasts were spellbound by James Hyland, skipper of *Mermaid*, R.C.Y.C., and his friend Charlie Bourke, guest speakers. The year's trophies were presented. Two very active classes raced bi-weekly, Snipes and Rainbows. John Robertson, son of the "P" boat skipper, Norm Robertson, carried off the Snipe Championship; while the Rainbow Class was decided between Cliff Lunt and Jack McCuaig by the traditional toss of a coin.

▶ The following officers have been elected at Rochester Y.C.: commodore, Jonathan Heinrich; vice commodore, Phelps Langworthy; rear commodore, Clifton Baker; secretary, James Dale; treasurer, Ray Staub; corresponding secretary, Oscar Marth; directors for two years, Edward Doyle, Harold Field, Roland Roberts; measurer, Oscar Marth; delegates to L.Y.R.A., John VanVoorhis, Ritter Shumway, Oscar Marth.

▶ Lieut. Herb Hastings, a pilot with the U.S.A.A.F., has been reported missing. Herb was recently decorated for his actions and we all have high hopes that he will still turn up.

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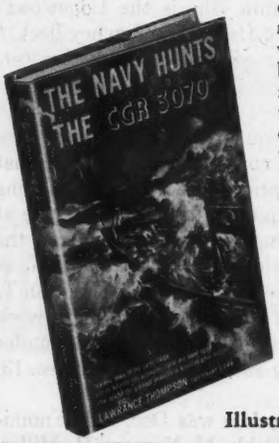

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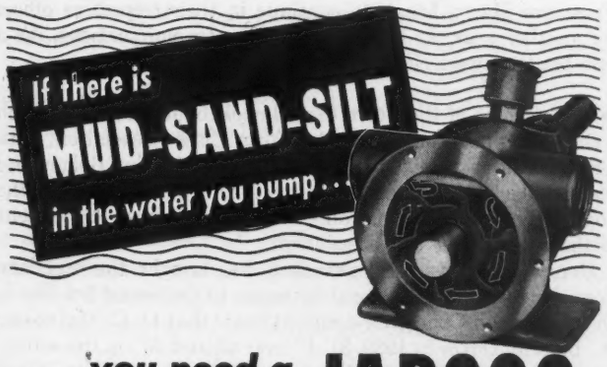

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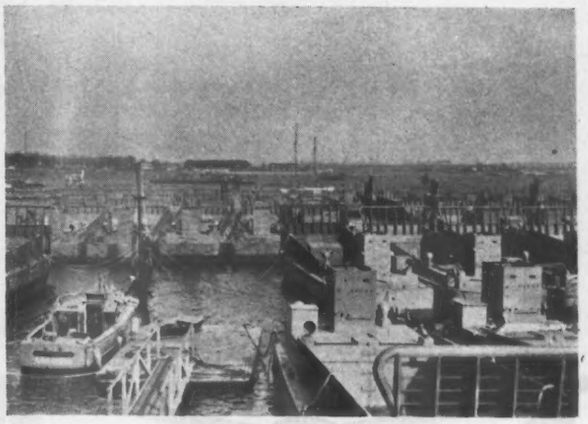

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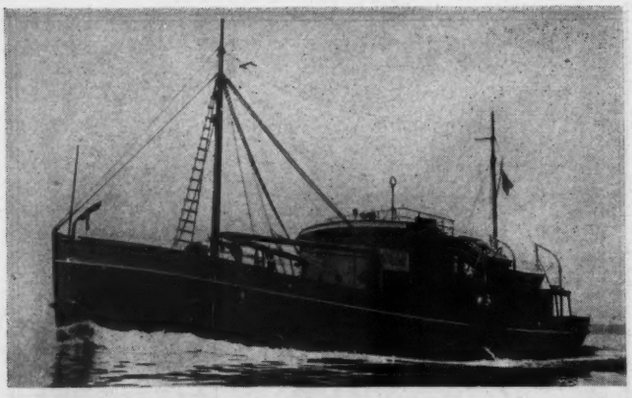

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NARRAGANSETT BAY GOSSIP

By Jeff Davis (Old Doc)

▶ None of the Rhode Island Yacht Club fleet is at the moorings, they're either tucked away in mothballs ashore, or tied up in wet storage in Pawtuxet Cove. The last one afloat was Earl Lofquist's cruiser, just turned back by the Coast Guard in time for Earl, on a 10-day leave from the Coast Guard, to get in a few days fishing before he left her to be hauled out.

▶ At the Edgewood Yacht Club, they're keeping the floats in position this winter, taking a chance on the river not icing up enough to do any harm to them. They risked it a year ago, and got away with it all right, and are hopeful this year. One boat, ex-Commodore Harry Livezey's *Hope II*, will lay alongside one of the floats all winter, kept in commission in case there's any need for a boat's service. Her cockpit has been cased in and she has had a heating plant installed to keep her warm inside, so she'll be ready to go at any minute. She is the Edgewood's contribution to the State Council of Defense emergency fleet. A year ago, the club had two boats in commission and they were called on several times.

▶ The Narragansett Bay Power Squadron has its winter program well under way, all but the course in piloting, and that will be long before this gets into print. The advanced piloting class is a double-header, one group of 22 taking the course at Providence, with Paul A. Merriam, N, as instructor, and the other group of 21, at East Greenwich, with Asa Hoxie, JN, as instructor. In the junior navigator class, with Prof. Leighton T. Bohl, JN, as instructor, eight men are registered for a 20-week course, while 10 JNs are aspiring to the rank of navigator under Charles R. Ballou, N. The piloting course was started Dec. 13.

▶ The Squadron's annual meeting date was Dec. 9. The nominating committee, Dr. Terrell E. Cobb, N, Norman B. Miller, JN, and Gerald B. McOsker, JN, nominated Vice Commander Paul A. Merriam to step up to Commander, Leighton T. Bohl for Vice Commander, and Secretary Charles R. Ballou and Treasurer Harry Leach to continue in their respective offices for another year. As there were no counter nominations, it's a safe bet they were elected.

▶ The owners of the Town Class knockabouts at the Taunton Yacht Club have organized the Town Class Association, with Fred White as president and secretary and John Bolger and Stewart Kelsey as race committee. The Town Class is the popular boat at the Taunton Club where at least 80 per cent of the boats in the bay are owned.

Henry E. Crowe, of Pawtucket, has bought the auxiliary sloop *Lauan* and has changed her name to *Crowsnest 3rd.* She is one of the twin Concordia-designed boats that D. C. McIntosh, Jr., built at Dover in 1939, 31′ 4″ over all and 25′ on the waterline, and has hailed from Naushon Island where she was one of the Forbes' family fleet.

▶ *Short ends:* Commodore Walter Winters, of the Edgewood Y. C., has appointed Edson Sawyer fleet captain and Dr. Paul C. Cook fleet surgeon. . . . Clarence M. Dunbar has sold his 50′ Elco *Advance* to Harry C. Foster, of Cranston. . . . The East Greenwich Y. C. is planning to build an addition to the clubhouse. . . . Dr. George A. Bridges, commodore of the East Greenwich Y. C., has sold his cruiser *Hel-Cat* to F. Martin Wier, of Annapolis, Md. . . . Ford Wilson has bought Edson Sawyer's 22′ Lyman launch *Wee Three.* . . . There's another Herreshoff "S" to be added to the new class here in the spring; Roberts Parsons has bought the *Volante* for his son Sam who is in the Navy. *Volante* is stored at Marblehead and will stay there until spring. . . . Quite a number of the boats the Coast Guard took over a year ago have been turned back to their owners; that is, their owners have been notified to come and get them. Several of them were taken to Fairhaven last spring and stored in the boat yards there, unused all summer, but the notices that the owners could have them back came too late for the owners to get any good from them.

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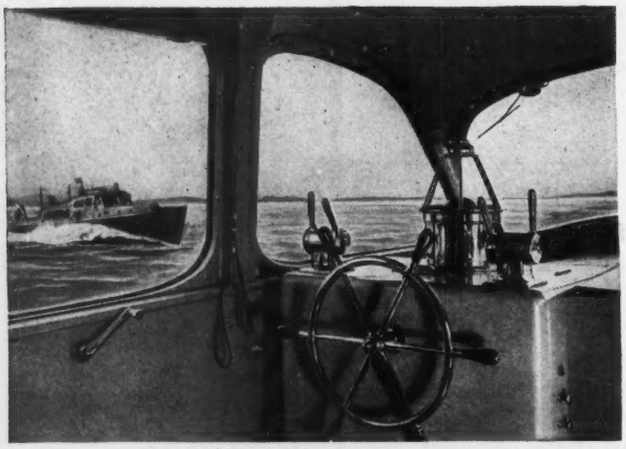

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CHESAPEAKE BAY ACTIVITIES

By Bugeye Bill

▶ The Chesapeake Bay Yacht Racing Association held its annual meeting last month in Baltimore as guest of the Gibson Island Yacht Squadron, and delegates from many sections of the Bay reëlected their officers for another year. Stanley B. Trott, of Annapolis Y.C., is president; Sigurd N. Hersloff, Tred Avon Y.C., vice president; F. Harold Loweree, G.I.Y.S., secretary-treasurer; and William W. Heintz, West River Sailing Club, and James J. Faye, Rappahannock River Y.C., members of the Advisory Committee.

While there were only eight sanctioned regattas held on the Bay in 1943, the Association decided to go ahead with the awarding of its high point trophies for that year. But for 1944, and for the duration, the delegates voted to suspend competition for the prizes. The Advisory Committee was given authority to return the trophies any time conditions on the Bay improved. The 1943 winners are: *Highland Light*, U.S. Naval Academy, Cruising Division; *Blue Moon*, Francis Taylor, of Potapskut S.A., Delta Class; *Flapper*, Dave Gaillard, of G.I.Y.S., Star Class; *Chesapeake*, Dick Hartge of W.R.S.C., Chesapeake 20s Class; *Rumpus*, Mary Lou Truslow, of Chester River Y. & C.C., Hampton One-designs; *Hi-C's*, Frank Howard, of Capital Y.C., Comet Class; *Wiki-Wiki*, W. C. McNiel, of Sparrows Point Y.C., Snipe Class. No boats qualified in the racing division. *Highland Light*, which turned in an excellent performance last season, was skippered by Comdr. Clarke Withers.

It's interesting to note, in figures supplied by Record Committee Chairman Roger Carson that, despite the war, there were only six fewer cruising boats competing in 1943 events than in 1942. Twenty-seven were recorded racing in 1942 as against 21 last year. A total of 115 boats of all classes raced in the year's eight events, as against 224 in some 30 events the year before.

Commodore Pete Magruder extended an invitation, which was accepted, to hold the 1944 annual meeting of the Association at Annapolis Y.C. He also proposed that the C.B.Y.R.A. rendezvous be held at Annapolis, should the club find it possible to resume its regatta, scheduled for July 8 and 9.

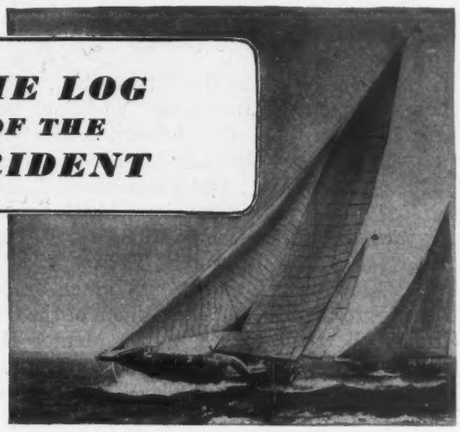
With a few minor changes, delegates approved the 1944 regatta schedule and went on record that dates established prior to the war for all clubs would rule at the end of the war. Officials are looking to the day when there will be more clubs seeking regatta dates than there are week ends in the racing year.

▶ A large crowd turned out for the banquet marking the installation of Maryland Y.C. officers last month in Baltimore. The new commodore is Albert W. Rhine, a cruiser owner and last year's vice commodore. He has been a member of Maryland for a number of years and has been active in club affairs. Other officers installed were: William E. Buettner, vice commodore; Harry Hallman, rear commodore; John Crowley, secretary-treasurer; P. N. Gooding, fleet captain; and Roger Carson, chairman of the Sail Division. The party was held in the clubhouse at Broening Park.

▶ Equally successful was the annual trophy presentation party last month of Potomac River Sailing Association, held in Washington's Capital Y.C. Prizes for spring, summer and fall series — donated by the P.R.S.A., Capital Y.C., Corinthian Y.C. and Columbia Y.C. — were awarded by Capt. H. G. Hemingway, Captain of the Port for Washington; Lt. Col. Bob Gear, recently returned from North Africa, and Arthur Clephane, charter member of P.R.S.A., who is now living in Philadelphia.

The Lightning Fleet high point trophy was presented Fred Shields, of Old Dominion B.C.; the Comet Fleet high point plaque went to Clarke Daniel, of Capital, and the Old Dominion B.C. Perpetual trophy for Chesapeake 20s, to Don Kanode. First, second and third place prizes for the three series also were awarded. Their names have been reported in this column in previous issues.

THE LOG OF THE TRIDENT



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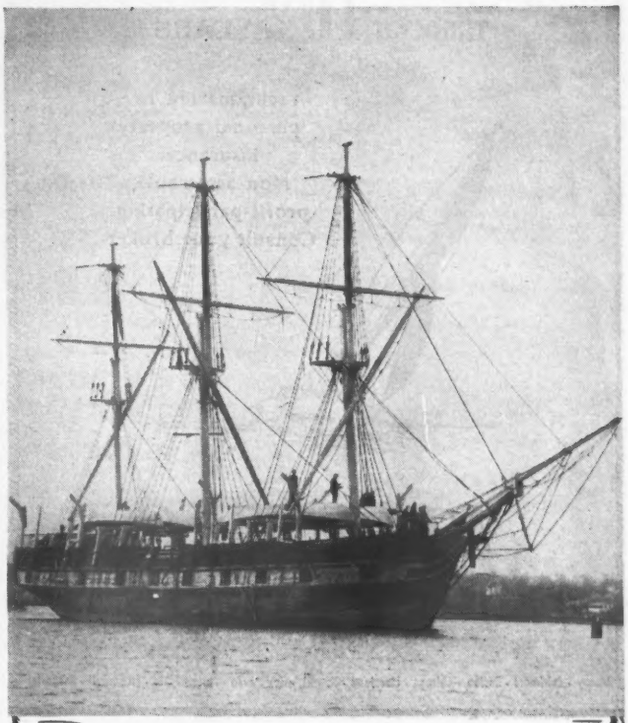

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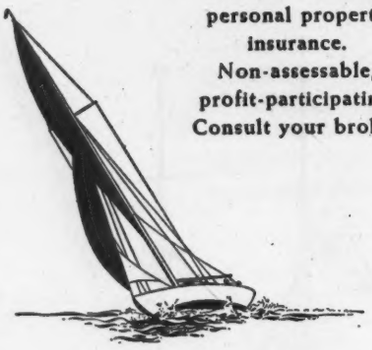

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THE SOUTH SHORE OF LAKE ERIE

By John G. Robinson

▶ Joseph F. Nagel, of the Edison B.C., Detroit, was elected commodore of the Inter-Lake Yachting Association at the annual fall meeting of that body, held at Hotel Hollenden, Cleveland, on December 4. Other officers elected were: James A. Beidler, Toledo Y.C., vice commodore; Lester R. Mylander, Sandusky Y.C., rear commodore; M. H. Seward, Edison B.C., sail yacht measurer; George Michaux, Sandusky Y.C., power boat measurer; A. J. Grundy, Detroit Y.C., D. K. McBride, Portage Lakes Y.C. and Alex Winton, Jr., Cleveland Y.C., delegates to the Yacht Racing Union of the Great Lakes; A. J. Grundy, R. H. Bostwick of the Mentor Harbor Y.C. and E. W. Kiefer, Port Huron Y.C., delegates to the Yacht Racing Union; John G. Robinson, Cleveland Y.C., James H. Hilling, Lakeside Y.C. and W. E. Lyman, Sandusky Y.C., delegates to the American Power Boat Association.

The date of the 1944 regatta was set for August 6–9 next at Put-in-Bay, Ohio.

▶ Andrew Shafer, one of the best of Lake Erie's skippers, was elected commodore of the Erie Y.C. at the annual meeting of that club. Other officers elected were: Richard Schlaudecker, vice commodore; Clarence Krug, rear commodore; Wm. Prehler, fleet captain; George Loesel, secretary and treasurer and Norman Parker, Robert Sternberg and H. Mosner, directors.

▶ Alfred Bubel, one of the Old Guard of the Edgewater Y.C., was elected commodore at the annual meeting of that organization on December 3. The new commodore served for three years as secretary and was chairman of the house committee for two seasons.

B. Elmer Jones was re-elected vice commodore; with Fred Beckley, rear commodore; Leo Young, treasurer; John Krause, secretary; Dr. Carl Schuller, sail boat measurer and Dr. Howard H. Davies, fleet surgeon. Newly elected trustees are: Ted Abel, William Lang and Leo Beauregard.

▶ Dan Krug, of Chippewa Lake, O., was elected commodore of the Chippewa Lake Y.C. for 1944. Assisting him will be Frank Janssen, of Cleveland, vice commodore; Larry Newberry, Medina, O., rear commodore; Monty Voss, Medina, O., treasurer and E. E. Nokar, Medina, O., treasurer. Bill Ritzi, of Parma, O.; Ray Blesh, of Wadsworth, O., and Syd Jackson of Medina, O., are the new trustees.

▶ In the recent death of Dr. Varney Barnes, Cleveland orthodontist and yachtsman, Cleveland loses one of its most enthusiastic educational workers. Dr. Barnes was a specialist in his own profession and when he became interested in the work of the U.S. Power Squadron he applied his talents to visual education in teaching the buoyage system. In his spare time he constructed models of all types of buoys and aids to navigation, which he used in visual demonstrations in the teaching of novices the art of navigation. His work was nationally recognized by the governing board of the U.S. Power Squadron for outstanding merit.

▶ The sailors of the Mentor Harbor Y.C.'s Snipe fleet were the last to stop racing on Lake Erie this season and quit only when ice threatened to freeze in their boats. Howard Morris was the club's Snipe class champion for the season on total points accumulated in the two series run off during the season. Dave Schoales was the runner-up for season honors.

▶ Gordon (Sandy) Douglass, well known specialist in 14-foot International dinghies, was elected commodore of the Vermilion B.C. at the annual meeting of the club December 2. Arch Stevenson was elected vice commodore and in addition will hold the office of secretary-treasurer. Bob Root, of Plymouth, O., is the new rear commodore.

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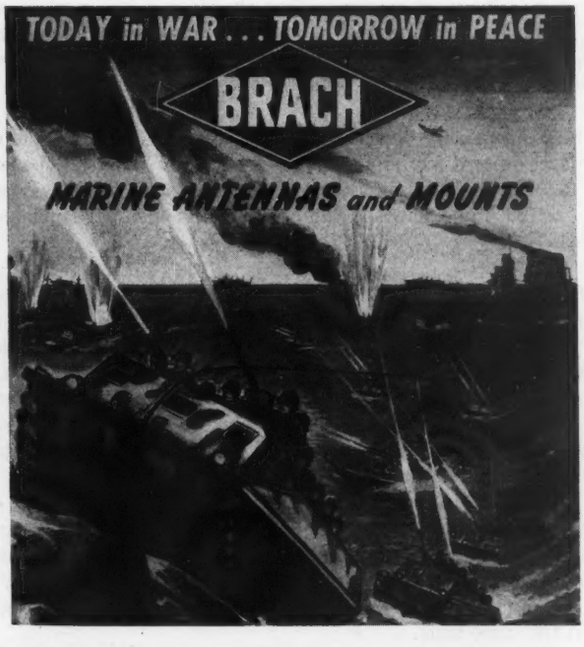

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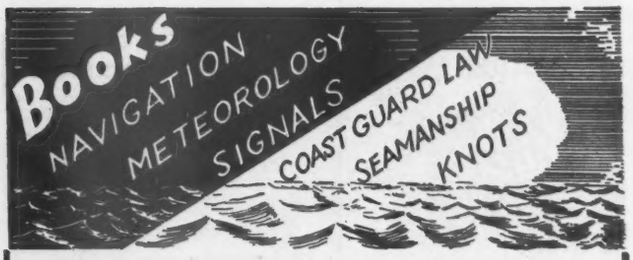

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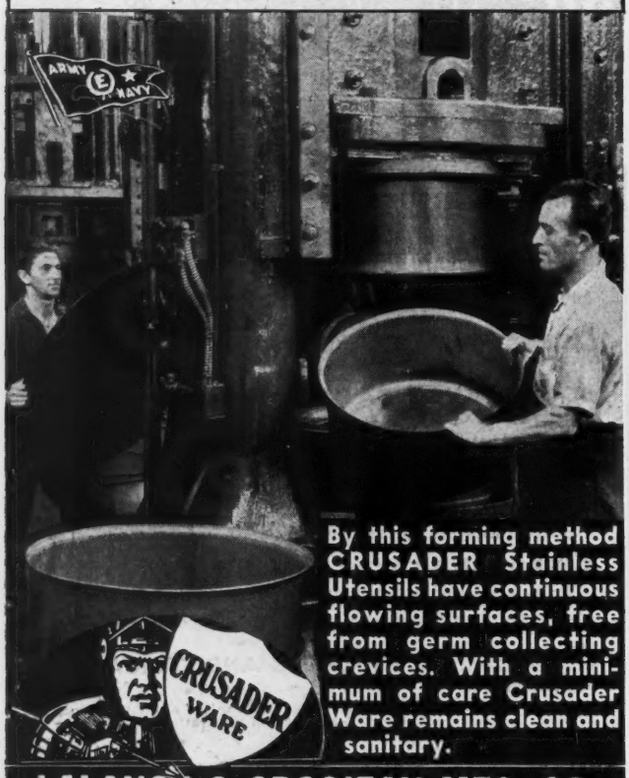

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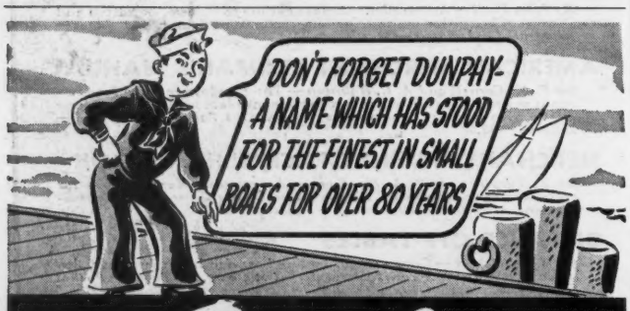

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PACIFIC NORTHWEST CAT'S-PAWS

By Ray Krantz

▶ British Columbia seems gradually to be taking on the reputation as a terminal point for some of the more outstanding ocean voyages by sailing yachts and other small wind-driven craft. Latest along this line was the arrival at Victoria, B.C., late in November, of the 48′ schooner *Lorna D*, after five years cruising in the south seas.

Lorna D was skippered by her owner, Capt. A. J. Davidge, and the crew for the final leg home from the Marquesas, a 61-day episode, comprised Mrs. Davidge, Dick Davidge, and a work-a-way, Jasper Moore. *Lorna D.* is to be tied up after five restless years in southern latitudes, at Maple Bay, near the better known Cowichan Bay, B.C.

▶ *Lorna D's* voyage brings to mind the arrival of several other sailing vessels at Victoria, notably, in the 1920's, of Captain A. Waard's Chinese junk *Amoy*, more recently, George Dibbern's New Zealand yawl *Te Rapunga*, and about ten years ago, Capt. Ernest Philip Green's 50′ Diesel auxiliary schooner *Romance*, which latter craft had a rough-tough voyage across the North Pacific from Hong Kong to British Columbia. Also, it is interesting to recall that the hull of Captain George Voss' Indian canoe *Tilikum* is a relic today in Victoria's Thunderbird park; *Tilikum* made a 40,000-mile world voyage from Victoria, before 1900.

▶ Atlantic coast yachtsmen who love the whistling of the wind through the rigging and a lee rail down, will get a kick out of the travels of the famous 52′ auxiliary yawl *Dorade*. This handy craft (handy at winning races) arrived at the Blanchard Boat Company yard at Seattle late in November after a voyage up the coast in command of Myron Spaulding, of San Francisco. *Dorade* has been acquired by Ralph James, Jr., of the Seattle Y.C., the previous owner being James Michael, of San Francisco. *Dorade* originally was personal boat of her designer, Olin Stephens. The yawl made excellent showings in ocean races on both the Atlantic and the Pacific. Her auxiliary is a four-52 Gray gasoline engine. *Dorade* no doubt will show her established sailing abilities in the spring races of 1944.

▶ First new Army boat contracts to be awarded Seattle shipyards in quite a few months went to Grandy Boat Company, for 37′ Eureka landing boats, and Lester and Franck Boat Co., for 26′ mine yawls. Grandy will build also a 74′ fishing vessel.

▶ Due to the fact that fishing vessels are food producers, the construction of a fair number of these vessels has been allowed by the government. One of these is the new 51′ *Verma*, with 80 hp. Lathrop engine, built by the Jacobsen yard, Seattle, for Capt. Fred Sorensen, Seattle, former owner of the halibut schooner *Havana*. *Verma* was launched late in November. Sorensen plans to install a combined radiophone and direction finder (Fisher manufacture) on board *Verma*.

▶ Sagstad Shipyards' La Conner plant was scheduled to launch a fourth 204′ non-propelled barge for the Army about the middle of December. The company's Seattle plant similarly was planning for a December launching of a 126′ Army tug about the same time.

▶ You'd think that boat builders would get enough of boats each day but, surprisingly enough, they often turn out to be some of the most enthusiastic of boat owners and operators. Among these double-duty yachtsmen at Seattle is Olof Olson, who helps build 45′ Navy Picket boats at the N. J. Blanchard Boat Co.; then he turns his attention to his 28′ sloop *Evelyn Mae*, which is auxiliary powered with a Universal Flexifour.

▶ Even Mike Shain, w.k. Seattle boat builder specializing in yachts, talks about building for his own use a 50′ streamlined express cruiser with twin 320 hp. V-12 Scripps engines. . . .

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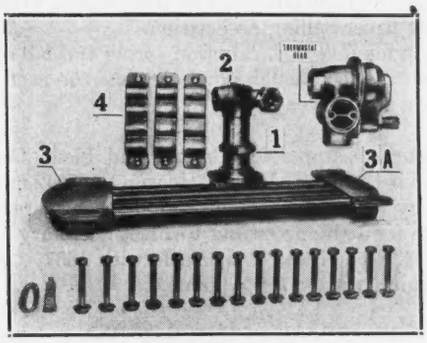

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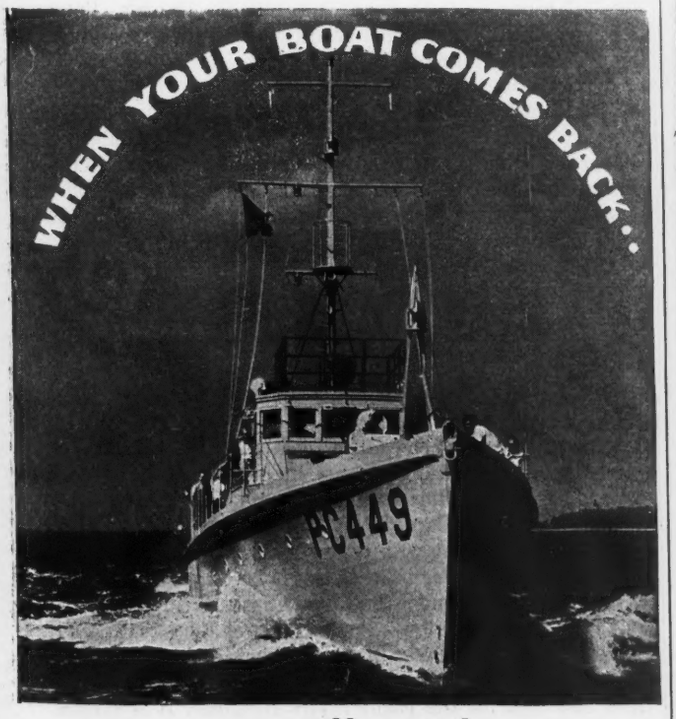

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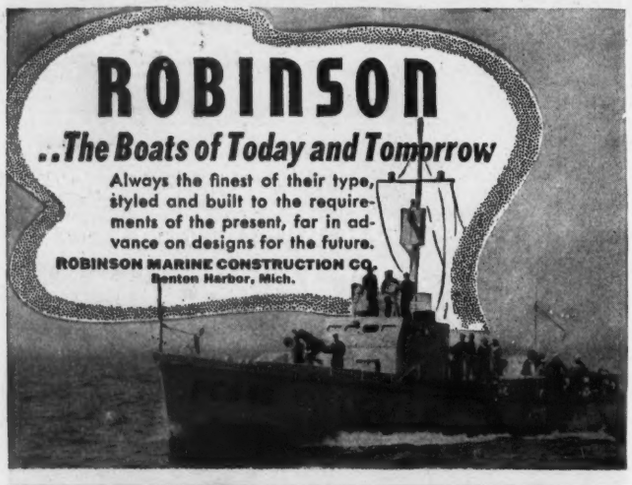
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COMET COMMENTS

By Malcolm D. Lamborne, Jr.

▶ Two Comet skippers stand out in the Chesapeake Bay area for the season of 1943. One is Frank Howard, a newcomer to sailing Comets, and the other, Clarke Daniel, is an old hand in the Class. Both hail from Washington's Capital Y.C. and are members of Potomac River Fleet No. 2.

Howard, with his *Hi-C's*, was awarded last month the Chesapeake Bay Y.R.A. high point trophy for the year. Winner the year before was Lt. Ed Braddock, also of Potomac River Fleet. Howard also won the fall series at Washington, under auspices of Potomac River Sailing Association.

Daniel, in his *Robert E. Lee*, won spring and fall series in the Capital and totaled enough points to take the fleet high point trophy for a second year.

▶ High scoring skipper for Green Pond Fleet, Green Pond, N. J., again is Harold T. Martin. He won the 1942 national high point trophy with one of the highest scores ever recorded. His fleet points for 1943, according to Fleet Secretary Herb Post, were 1723⅚. Second was E. J. Dath, with 1657⅛ points, and Post was third, with 1575⁵⁄₁₁ points.

▶ Comet sailors at Medford B.C., near Boston, have put their boats away for the winter, but that doesn't mean they are through until spring. Many of the Comet enthusiasts are preparing for iceboating on Medford Lake. John Black reports there will be 12 stern-steering and 8 new front-steering iceboats out this winter.

▶ Reports on Comet sailors in the Service. . . . Lt. John Loughran, who sailed Comet No. 1133 at Seaside Park Y.C. on Barnegat Bay, is now piloting a Marine bomber. . . . Lt. Herbert Rommel, U.S.N.R., who sailed No. 751 on Barnegat, recently returned home to Philadelphia after three years' absence; he was in the *Oklahoma* when she was bombed by the Japs at Pearl Harbor. . . . Cushing and Raleigh Daniels, Potomac River sailors, are now junior grade lieutenants in the Navy and are teaching aerial navigation.

▶ The annual meeting of the Comet Class Y.R.A. will be held January 15, at 6 p.m., in the New York Yacht Club, with a dinner following. The Executive Committee meets at 4:00 p.m. The nominating committee, which will submit a slate of officers, consists of Herbert L. Stone, John J. Fernandes, Jr., and Malcolm Lamborne, Jr.

ON THE NIAGARA FRONTIER

By James H. Daniels

▶ Now that winter has taken over, a few of the boys have started plans for improvements in hull and rigging looking toward ease in handling with the current crew shortage. Down at Olcott, N. Y., Capt. Walt Roberts' schooner *Charmante Helene* will come out with a new mainsail and bulldriver rig. There is speculation as to what this latter improvement will do to the ship's rating under the Royal Ocean Racing Rule. "Captain Horatius Doyleblower," alias "Elmer the Great," or Bud Doyle, three-time winner of the Barthel Trophy, emblematic of the Eight Metre championship of the Great Lakes, is cooking up a new deal for the Eight Metre *Bangalor*. It is surprising what one can find under the pile in the locker with war time shortages.

▶ Shorty Holzworth has had his crew hard at work this fall on the Ten Metre *Sealark*. Some of the current improvements should make the ship a contender at Put-in-Bay next summer; the way they plan it. This crew are all in the Buffalo Power Squadron piloting class and will have at least five new members for *Sealark's* afterguard on the cruise to the Bay.

At a recent meeting held at the Buffalo Motor Boat Club, the following men were elected to officers and will head the Buffalo Power Squadron for the new year:

Commander: Howard M. Sharp, skipper of the cutter *Moosabec*, sailing out of Youngstown, N. Y.

Vice Commander: Edwin C. Roseberry, skipper of the Lightning *Judith*, from the Buffalo C.C. fleet.

Flag Lieutenant: Reginald H. Pegrum, member of the National Lightning class championship crew, from the Buffalo C.C.

Secretary: Charles J. Jennings, owner of the cruiser *Hanni*, hailing from the Buffalo Y.C.

Treasurer: Robert B. Warman, whose Richardson cruiser *Vonda* has more hours of patrol to her credit than any auxiliary ship in the division.

National Lightning champion skipper Karl Smither, from the Buffalo C.C., has become Commander of Flotilla 302 U.S.C.G.A.

MAINE COAST NOTES

By Lawrence B. Getchell

▶ The House Rivers and Harbors Committee considerably brightened the outlook for post-war yachting Down East when it approved recently the five projects proposed for the Maine coast. Altogether, these projects call for an expenditure of nearly $1,000,000, and the Committee's action virtually assures that they will be included in the Rivers and Harbors Bill which is scheduled for Congressional authorization in 1944.

▶ Strictly from a yachting viewpoint, the Number One project in this approved list is the $94,500 harbor improvement program proposed for Northeast Harbor, already Maine's most active yachting center. The work planned for this port includes dredging a new anchorage area of approximately 25 acres with a channel 10′ deep extending therefrom to the harbor. It is understood that Northeast's part in the program will be to furnish a suitably bulkheaded spoil disposal area and to provide the new anchorage with a public landing equipped for the service and supply of recreational craft.

▶ At Hendricks' Harbor, home anchorage of the Southport Y.C., the construction of an entrance channel 30′ wide and 9′ deep at mean low water has been recommended.

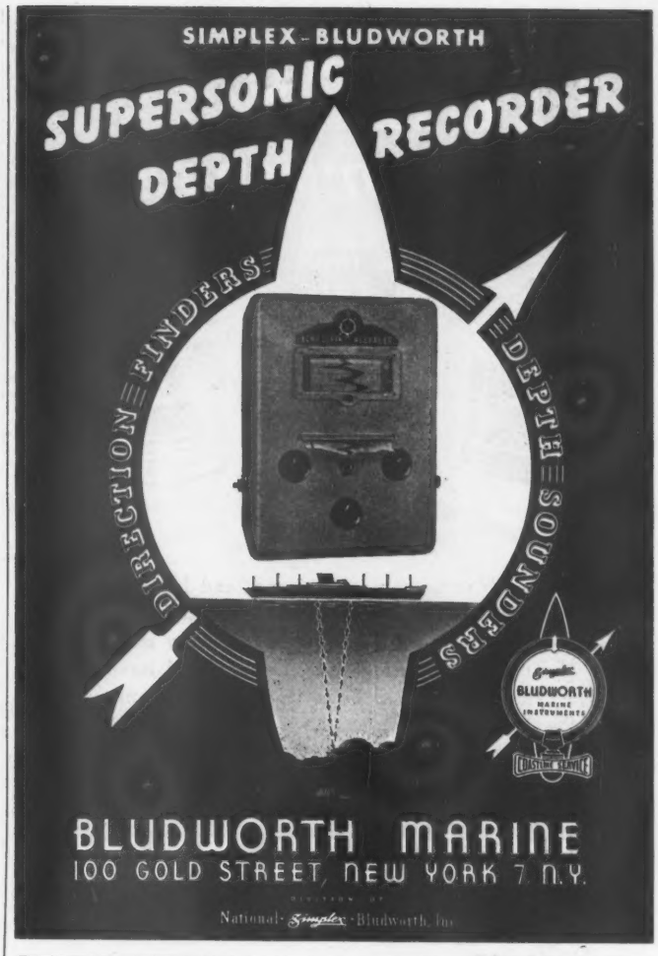
▶ The program approved for Ogunquit includes dredging a 40′ wide channel from the Josias River to Flat Pond where a yacht basin about 3 acres in area is to be provided. Mean low water depth of the channel and basin is to be 5′.

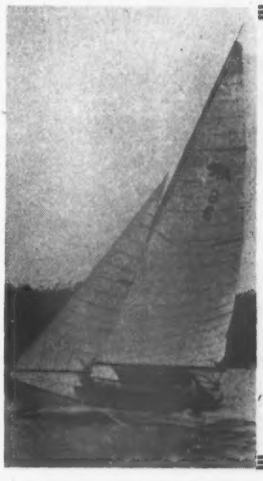
▶ The $28,000 program recommended for Isle Au Haut will be of especial interest to yachtsmen as it calls for the dredging of a channel through the shoal at the easterly end of the Thoroughfare. The channel will be 75′ wide, 1200′ long, and 6′ deep at m.l.w. Contingent with this undertaking, Isle Au Haut must provide and maintain a public landing on the Thoroughfare.

▶ According to an announcement made in East Boothbay, Wallace W. Goudy has retired from ownership in the firm of Goudy and Stevens, the well known yacht building organization founded by Mr. Goudy and J. Arthur Stevens in 1922. The business will be carried on by Mr. Stevens with the association of his sons James and J. Arthur, Jr., and his son-in-law Frank Cummings. No change in the firm's name is contemplated.

▶ Emory S. Basford, of MacMahan Island, has bought the sloop *Akela*, formerly owned by Commodore Glidden, of the Southport Y.C.; while Donald Walker, also of MacMahan, has acquired the sloop *Rosina* through Captain Osborne Brewer who built her. These transfers will add a couple of boats to the flotilla in Sheepscot Bay.

Raymond Philbrick, of Rockland, has sold his 62′ motor cruiser *Mione* to the Jonesport Packing Co. who will have her converted to a sardine smack by D. J. Stuart, of Machiasport.





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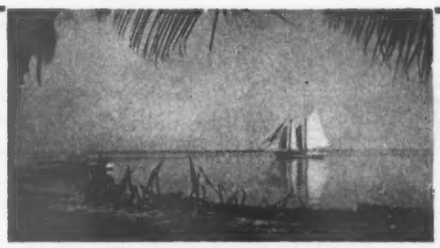

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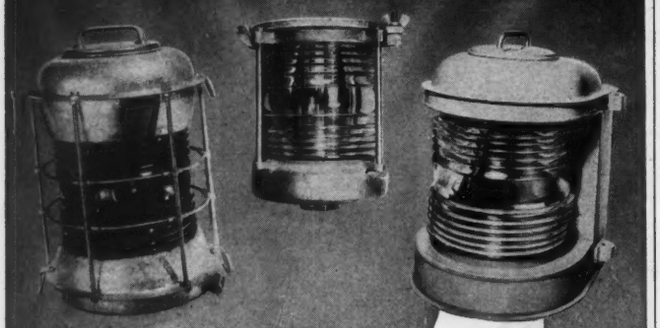

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FLORIDA TRADE WINDS

By Vivyan Hall

▶ Probably in no branch of the naval service is small boat experience so important as in the handling of landing craft. That experience is evident throughout the staff of the amphibious training base which Captain C. Gulbranson set up at Fort Pierce following the African invasion. Captain Gulbranson himself sailed as a boy around Chicago and at the Naval Academy. Commander J. G. Farnsworth, the executive officer, sailed catboats out of Gloucester and on Ipswich Bay. Lt. Com. K. B. Emmons raced in the Six Metres and in the early Bermuda events. Commander D. G. Womack, senior medical officer, handled boats at the New Orleans and Pensacola yacht clubs. And so on down.

▶ Having completed a number of 104-foot aircraft rescue vessels for the Army, Dooley's Basin & Dry Dock, Inc., at Fort Lauderdale, is now building a smaller and much faster rescue boat, also for the Army. The first of these handsome craft, from a new design by Dair N. Long, was launched December 4. Cal Meloon's Pinecastle Boat Co., at Titusville, is busy on a new contract for 32-foot aircraft rearmament boats for the Navy. This yard has just finished delivering a number of 26-foot personnel boats. More of the personnel boats have been delivered by the Fort Pierce Boat Works, which is also starting in on a new order for the rearmament boats. Tod Backus, president, who has increase his staff here to some seventy and taken over the Bull Line dock warehouse, used to turn out the clinker built fishing boats known as Backus skiffs.

▶ In spite of many handicaps, the junior division of the Palm Beach Y.C. keeps right on with their sailing regattas. Thomas Riggs is the commodore of this group and Lynn Nichols and W. J. von Behren, former flag officers of the parent club, serve as race judges. J. D. Jacobs' *Revenge* has been leading the Moth Class and Hugh Tyndall's *Gull*, the dinghies. In the Snipes, Walter Keyes' *Hawk* took the November series with Bill Nexen's *Ibis* beating out Henry Pennan's *Idyl* for second. John Swaringen leads the B Handicap class with his *Viking*, followed by David Brooks' *Sea Fox* and Charles McIntosh's *Swoosh*. Open class honors have gone to Ronald Geer's *Fairy Swan*, with Albah Row's *Alone* and Bruce Tyndall's *Mystery* close behind. Patricia Hillyer leads the girls' group in her *Hornet*. New officers of the Tampa Yacht and Country C. include L. B. Kinchley, commodore; John R. Himes, vice commodore; and H. L. Crowder, secretary and treasurer.

▶ Richard J. Reynolds, who raced the *Elizabeth McCaw* and *Blitzen*, has finished his course at the Subchaser School at Miami. Back for postgraduate work are Kirk Safford, who crewed on *Mandoo*, and Woodward Rich, who crewed on *Stormy Weather*. It was Rich who stood by with his Coast Guard ship and picked up the survivors when the USS *Plymouth*, formerly William K. Vanderbilt's *Alva*, was sunk several months ago. John Heard, of the St. Francis Y.C. out in San Francisco, and Paul Rust, Jr., who raced his *Amberjack II* to England, are now taking the subchaser training. Others who have turned from winning ocean races to winning wars are William McMillan, whose schooners *Merry Widow* and *Water Gipsy* raced in Bermuda and transatlantic events, and Charles F. Tillinghast, Jr., who received the Cruising Club's Blue Water Medal in 1935 for bringing the *Hamrah* back to port after her owner and two sons had been lost at sea during the race to Norway. Both are in the Navy and now at Miami.

▶ James Brickell, who has kept *Starlight* in commission while navigating Pan American planes to Africa and Asia, has now been commissioned in the Navy. Gilbert Ottley, who raced his *Falcon* out of Glen Cove, is attached to the Seventh Naval District headquarters. Houston Wall, who set an early record to Havana with *Haligonian*, is a lieutenant commander in the Coast Guard with pilot duties out of Tampa.

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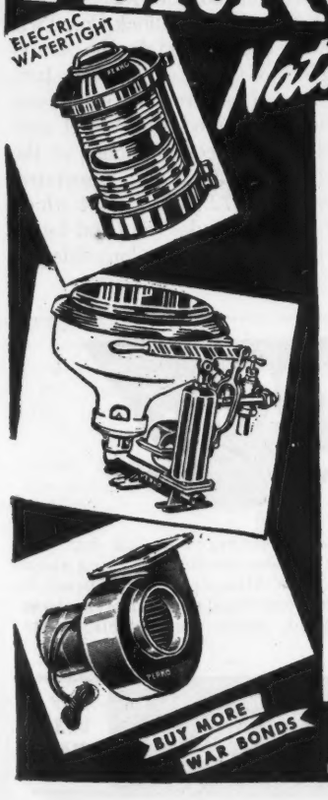

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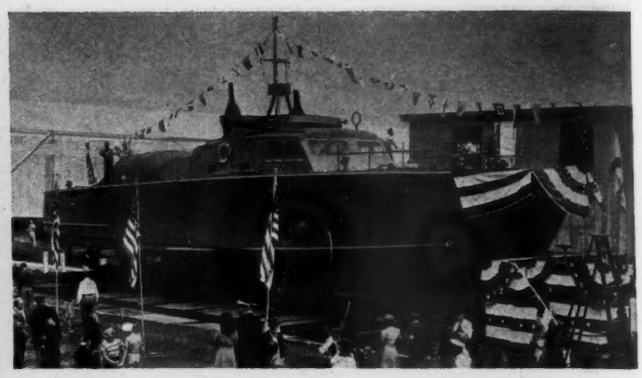

Just before the launching of the "Maj. Gen. C. L. Tinker," one of the AAF'S new 85' crash boats, at Dooley's Basin & Dry Dock Co.

NEWS OF THE INDUSTRY

IN THE NEWS

▶ The firm of John H. Wells has moved to new and larger quarters at 515 Madison Avenue, where they have opened up a special department for post-war designs. The firm also announces that Herman Jagle, long prominent in yachting circles, is now associated with their brokerage department. . . . G. Gilbert Wyland, chief engineer of Sparkman & Stephens, has been elected a director of the corporation. Before joining that firm Mr. Wyland was with the engineering department of the Navy and the Electric Boat Co.

Charles F. Baltzer, president of the Baltzer-Jonesport Boat Corp., has been appointed an official naval photographer for the 1st Naval District. . . . George H. Stadel, Jr., has joined the staff of Wm. Edgar John and Associates. . . . Don B. Wallace, well-known in the marine lumber field, has opened his own firm in Detroit under the name of Don B. Wallace & Co. . . . James H. Pierce, who made many contributions leading to the improvement of the marine motor, recently passed away in Bay City, Mich.

ON THE PRODUCTION LINE

▶ The Army-Navy "E" was recently awarded the Outboard Marine & Manufacturing Co. (Evinrude Motors), The Harbor Boat Building Co. (their fourth), The Chelsea Clock Co., Twin Discs Clutch Co. . . . A star has been added to the Army-Navy "E" banners of John Reiner & Co., I. F. Laucks, Inc., and Frank L. Sample, Jr., Inc. . . . In a ceremony which was perhaps without precedent, the first armed war vessel ever built in Westchester County, N. Y., was commissioned at the Milton Point Shipyards of Wm. Edgar John and Associates, Inc. She was *Q-1360*, a heavily armed 72' patrol boat which was delivered by the Navy to the British under the Lend-Lease Act. . . . When PC *1209* was launched by the Consolidated, her sponsor was Mrs. George E. Roosevelt.

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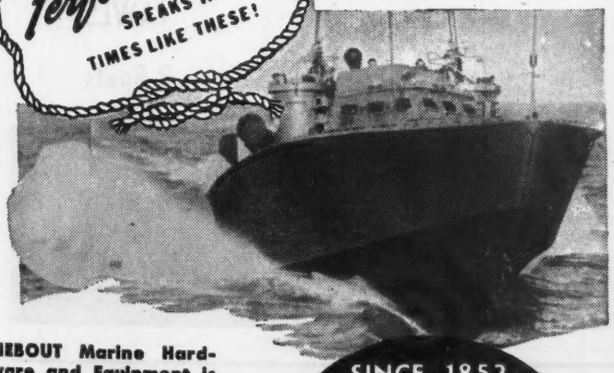

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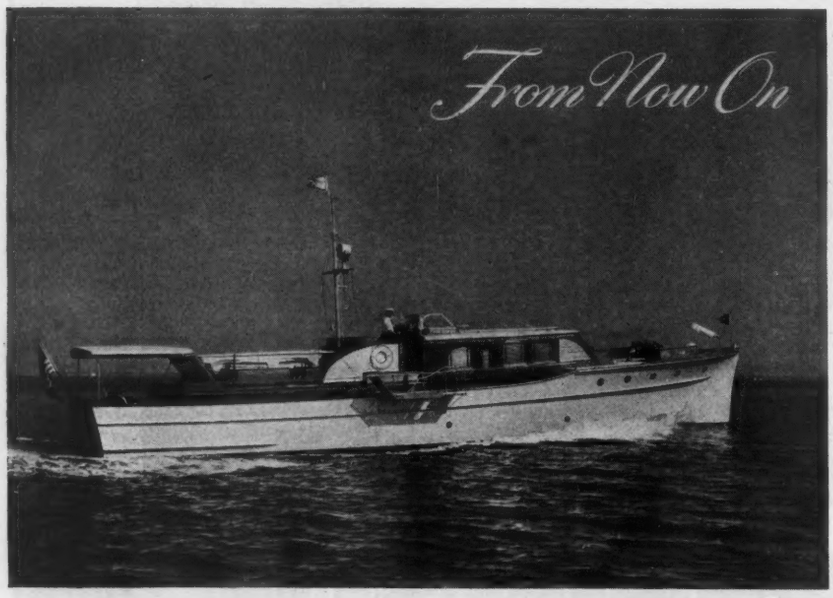

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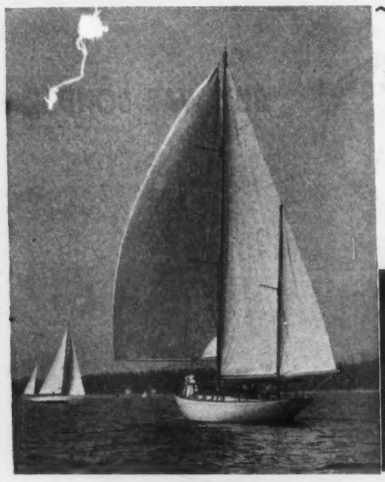

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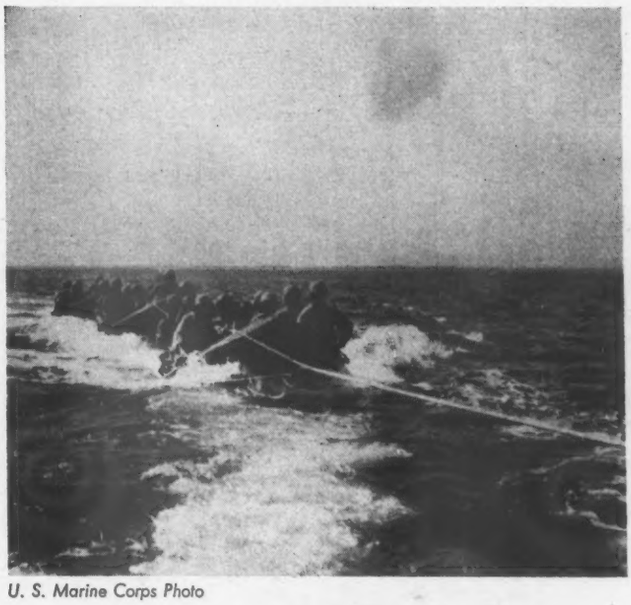

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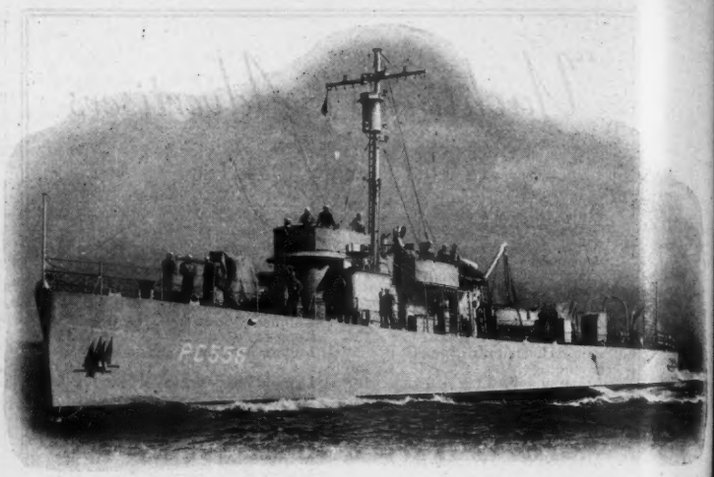

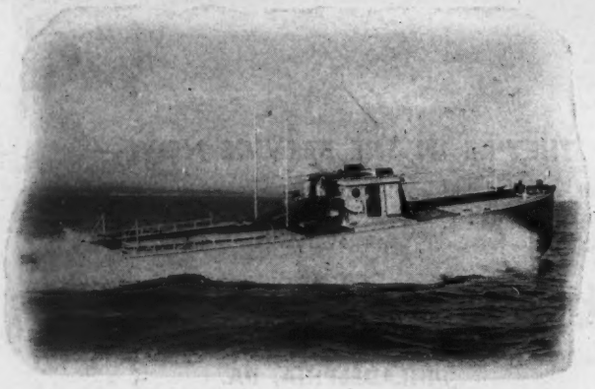

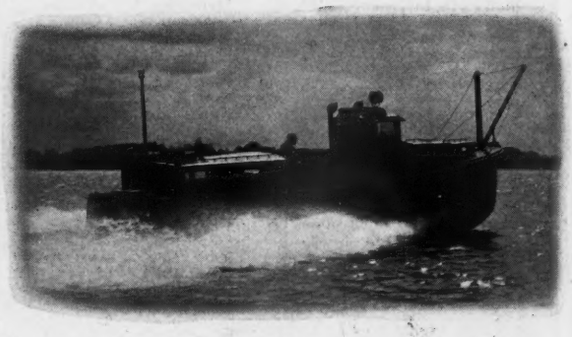

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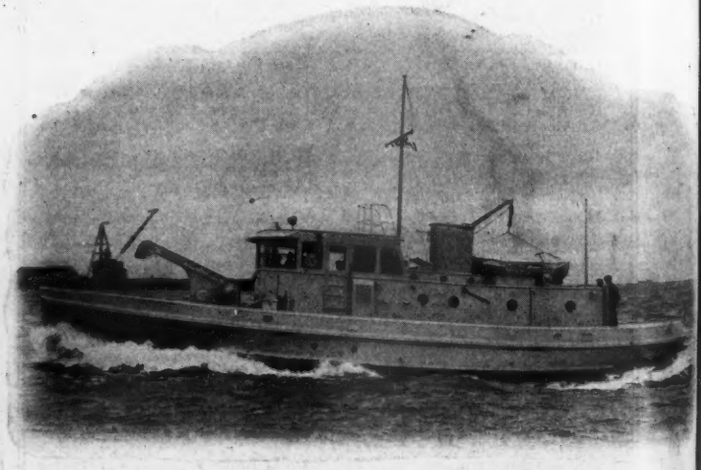

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READY
for any emergency

You can't train thousands of Navy fledglings to split the flight deck of a converted lake steamer with their landing gear without having a few of them spin into the "drink."

But the Navy is ready for just such an emergency and has the crash boats that get there in time so that the embryonic wearer of the golden wings usually suffers little more than a ducking.

We are proud to have a hand in this rescue work. For it is Sterling Admiral (Vimalert design), Petrel and Dolphin engines that power many of these fast, dependable little craft.

And the ruggedness, dependability and mo power per pound of weight that we now bui into these engines, are giving us valuable expe ence for post-war days to come.

On the first sunny Spring Sunday after "V" da when you begin making plans to go "overboar you're going to find that Sterling's new techniq of producing precision built marine and indu trial engines on a mass production basis, will gi you an even finer engine than the old Sterli you knew so well, and one that's more econo cal to install and to run.

READY FOR ANY EMERGENCY TOO, is the Sterling engine that drives the auxiliary lighting plant in the Mt. Hamilton Hospital. Again when life or death hangs by a thread, power cannot fail.

NG ENGINE Compa

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